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FORTY-NINTH ANNUAL REPORT

OF THE

BOARD OF EDUCATION:

TOGETHER WITH THE

FORTY-NINTH ANNUAL REPORT

OF THE

SECRETARY OF THE BOARD.

1884-85.

JANUARY, 1886.

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STATE BOARD OF EDUCATION, 1886.

EX OFFICIO.

HIS EXCELLENCY GEORGE D. ROBINSON, *Governor.*

HIS HONOR OLIVER AMES, *Lieutenant-Governor.*

BY APPOINTMENT.

		TERM EXPIRES.
HORACE E. SCUDDER	<i>Cambridge</i>	May 25, 1886.
ADMIRAL P. STONE	<i>Springfield</i>	May 25, 1887.
ABBY W. MAY	<i>Boston</i>	May 25, 1888.
MILTON B. WHITNEY	<i>Westfield</i>	May 25, 1889.
FRANCIS A. WALKER	<i>Boston</i>	May 25, 1890.
EDWARD C. CARRIGAN	<i>Boston</i>	May 25, 1891.
ELIJAH B. STODDARD	<i>Worcester</i>	May 25, 1892.
ALONZO A. MINER	<i>Boston</i>	May 25, 1893.

SECRETARY.

JOHN W. DICKINSON *Newton.*

ASSISTANT SECRETARY AND TREASURER.

C. B. TILLINGHAST. *Boston.*

AGENTS.

GEORGE A. WALTON *Newton.*
 GEORGE H. MARTIN *Bridgewater.*
 JOHN T. PRINCE *Waltham.*

ANNUAL REPORT

OF THE

BOARD OF EDUCATION.

ANNUAL REPORT.

The Board of Education is charged with certain specific duties and with a general duty. It has the supervision of the Normal Schools; it employs agents who visit the several towns, and who, under the direction of the Secretary of the Board, hold Teachers' Institutes; it advises regarding the several charitable educational institutions which receive State aid; it nominates the recipients of State scholarships; it reports upon such communications as it may receive from the governor or the legislature; and it occupies itself with whatever is likely to promote the best interests of education in the Commonwealth. In making its Forty-ninth Annual Report it desires to state, briefly, what it has done under these several heads, and to draw a few inferences from its observation and experience.

NORMAL SCHOOLS.

The special reports of the visitors of the several Normal Schools furnish particular information of the work of those schools during the past year. Upon one point only has the Board deemed it necessary to take general action. An examination disclosed considerable inequality in penmanship, and an apparent neglect of systematic instruction. The principals were accordingly advised to emphasize this part of the educational course, and to take such measures as would secure better results in the future. A good effect has already appeared in certain quarters, and it is expected that the teachers in the several Normal Schools, to whom this branch of education is assigned, will qualify themselves for instruction, when it shall appear that they are deficient.

Action has also been taken by the Board, in pursuance of an act of the legislature (chap. 330, Acts of 1885), for the erection of a building for the Normal Art School. Plans have been drawn with reference to the occupation of the land granted by the Commonwealth for this purpose; they have been approved by the governor and council, and it is expected that the coming year will see the building completed. The Board recognizes with pleasure the existence of a public sentiment of confidence in the school, which makes this action possible.

The housing and better equipment of the Normal Art School is in accordance with the settled policy of the Commonwealth, to maintain the efficiency of all the Normal Schools. These schools are in a healthy condition, and they are carrying forward their work with a strict regard for wise economy. Each is growing with a natural expansion as the demands of the schools for well-educated teachers increase. In one instance, however, this growth has been so considerable that the time has come, in the judgment of the Board, when it must be seriously considered in what way the needs of the school for further accommodation should be met. The Normal School at Framingham has outgrown its limits, and its present prosperity gives it an honorable claim upon the attention of the Commonwealth.

The development of this school under the conduct of Miss Hyde not only confirms the frequent saying that the teacher makes the school, but illustrates the general policy of the Board of Education. While the Board provides for a uniform system, it also desires to secure the greatest possible freedom within the system, and it values the personal element above every other. The spirit which moves the principal and assistants will be that which controls the pupils. The Board, therefore, conceives that its most important function is to place the Normal Schools in charge of men and women who are not only well-trained for the work of teaching teachers, but who bring to their task a high ideal and a spirit of devotion; who set the doing of excellent work above the wages received for the work, and who forget themselves.

When one forgets one's self in this world, it belongs to others to remember such an one, and the Board recognizes with gratitude the fidelity and patient continuance with which

one and another teacher in the Normal Schools has served the State. Without being governed by any statute in the matter, it holds firmly to the principle that a teacher's tenure of office, whether formally renewed or not, should be for good behavior under watchful and generous supervision.

STATE AGENTS.

There is little doubt that the establishment of the Normal Art School in a building especially designed for it will add to the efficiency of the school, and increase the attention paid to drawing in our school course. The graduates of the school are in immediate demand as teachers, and the steady use of the standard of excellence is compelling the schools throughout the State to secure competent instruction. The Board has taken the step, during the past year, of enrolling among its regular agents, the instructor in the Normal Art School who has heretofore been employed in systematic visitation of towns. His work does not materially differ from that which he performed before he was added to the number of agents, but the Board desired distinctly to recognize the importance of this branch of education, and to take the work of organization under its immediate charge.

The other general agents have continued their work of personal examination, and in connection with the Secretary of the Board, have held their customary Teachers' Institutes. They have reported regularly upon the condition of the schools, and their reports have engaged the earnest attention of the Board, from the disclosure which they make of the state of learning in parts of the Commonwealth which suffer from the evils attendant on isolation and absence of concentrated effort. The following extract from one of these reports will illustrate this point:—

“In my work this fall I find poorer buildings, more poorly supplied, smaller schools, cheaper and poorer teachers, and looser and less competent supervision.* It is impossible to picture to one who has not seen them some of these schools, so nearly worthless are they. The little money that is spent on them and the time of the children

* The comparison is made with the schools of another section of the State, and not with the previous condition of the schools under consideration.

are both wasted. I have found but one normal graduate in these towns, and nearly half of the teachers have had only a common school education in the towns where they are teaching. Nearly half also were teaching their first term in the schools in which I found them. The schools are visited by the committee but once or twice during the term, and they are rarely examined. If the pupils are in their seats and quiet; if they read without much stumbling, and seem to have learned their lessons fairly well, the committee are satisfied. Few of them are competent to apply any tests of the thoroughness of the work. Nearly all the children learn to read by spelling out the words. The only employment of the little ones is fingering the primer. The older ones study all lessons from the books, and all recitations are conducted by question and answer. In some towns there is not a globe or a map in a school-room, and the blackboards are scanty and poor. We can only reflect that the teachers could not use more if they were supplied. Almost without exception the buildings are destitute of the means of ventilation. After visiting the schools I have spent a half-day with the teachers and committee in suggesting improvements. The criticisms and suggestions are everywhere well received. If I, or some one else, could visit again in a month, and repeat the visits frequently, some good would be accomplished. In the present condition I see little to hope for."

Such a state of things as this report indicates calls for serious attention. It is very evident that the Board has not the power, through its agents, to effect rapid or permanent improvement in such cases. It can do scarcely more than awaken interest and make suggestion. Nor is it desirable that the work of raising the standard of education, in any given community, should be committed directly to the Board. There is no principle of our educational system more jealously to be guarded than that of local control and supervision, and it is the towns, and towns alone, that can properly be intrusted with the education of their children.

The palpable obstacle to improvement is in the poverty and isolation of the smaller towns. The cities and large towns have found it necessary to establish the system of superintendency, and results have shown the wisdom of this course. In the judgment of the Board, no one measure is more imperatively demanded, in the growth of the educational system of the Commonwealth, than the extension of the principle of superintendency to the smaller towns and villages. It is not to be

expected nor desired that these places should each be provided with a separate superintendent, but it is entirely possible that several neighboring towns and villages should combine to maintain a superintendent, whose duties would be substantially the same as those of one placed over an equal number of schools contained within a single large town.

Such an extension of the principle of superintendency would have a marked effect upon the entire educational system of the State. It would call into service those teachers and normal graduates who show a special aptitude for pedagogy, and would bring together, in various forms of association, men and women of both theoretical and practical knowledge of the art of teaching. It would, moreover, greatly stimulate the intellectual life of the remoter districts, and do steadily and methodically much of the work which can now be done only spasmodically by agents and teachers' institutes.

The time is ripe for such a movement. The country districts invite it; only their poverty stands in the way. If, in the judgment of the legislature, it should be deemed expedient to lay such an additional tax for educational purposes as was proposed at the last session, it is the opinion of the Board of Education that the first application of the money thus obtained should be toward the support of superintendents chosen by the smaller towns, acting upon some simple plan of combination.

CHARITABLE INSTITUTIONS.

As an intermediary between the government of the Commonwealth and the several charitable institutions, the Board has visited, through its committees, the schools which receive aid in one form or another from the State. It has considered the applications for State scholarships, and has endeavored to determine each case by reference to scholarship, character and circumstances. It has, also, patiently, and with great care, examined into the condition of every institution, not now receiving State aid, which has made application for the admission of pupils at the expense of the State.

NAUTICAL SCHOOL.

A respected citizen of the Commonwealth, long identified with maritime and commercial interests, Captain R. B. Forbes of Milton, has recommended the establishment of a nautical

school in the Port of Boston, for the training of youth in the practice of navigation and seamanship. By an act of Congress, passed in 1874, the Secretary of the Navy is empowered, on the application of the governors of certain States, named in the act, to provide a suitable vessel of the navy, with her apparel, charts, books and instruments, for the use of any nautical school at each or any of several ports, of which Boston is one, and to detail officers of the navy as managers and instructors. It is especially provided that no youth convicted of crime, or any of physical incapacity, shall be placed in such schools.

Under this act, the school-ship *St. Mary's* was accepted by the State of New York and placed under the control of the Board of Education of the city and county of New York, aided by the Chamber of Commerce of the city of New York. This school has been in active operation for the past ten years, and the results, so far as the training of pupils is concerned, have been satisfactory to the Board of Education.

At the time when the *St. Mary's* Nautical School was established, the Commonwealth of Massachusetts had just abandoned the experiment by which for twelve years a nautical school had been carried on upon the school-ships, *Massachusetts* and *George M. Barnard*. This experiment had not been wholly a failure; a large number of seamen had been trained, and the school-ship had especially served a purpose as a training school for the navy during the war for the Union. Nevertheless, it was not considered expedient to continue the maintenance of the school, on the ground partly of expense, and partly of the class of boys under instruction.

The school-ship of Massachusetts was established as a reform school. Its pupils were those only who had been convicted of some offence against the law. At first the boys sent to it were young offenders, but gradually the age was advanced, and more hardened cases were committed, to the increase of the difficulty of management. It is the general agreement that the experiment broke down under this severe test. Boys were sent to the school who had no aptitude for the sea, and whose characters impelled them to escape the discipline of the school-ship whenever they found opportunity. Masters of merchant vessels had no inclination to burden themselves with a distinctly penal class of seamen.

It is the opinion of the Board, that the success of the St. Mary's and the partial failure of the Massachusetts school-ships, alike point to the desirability of establishing a nautical school in the Commonwealth; that the present steady increase of the coastwise trade indicates that such a school would supply an important demand; that in the present condition of the merchant service, the opportunities for education granted to such boys as have an aptitude for the sea are inadequate and unsuitable. At the same time it is the opinion of the Board, that while the act of Congress, referred to above, permits such a school to be provided at less expense to the Commonwealth, the training provided under the act would be less applicable to the needs of the merchant service, than similar training at the hands of men familiar by experience with that service.

The question of the precise method which is most desirable for the conduct of such a school, is one which might properly be referred to citizens of the Commonwealth, whose vocation and experience especially qualify them to have an opinion in the matter; but the Board regards the whole subject of the establishment of a nautical school, one which may well receive the attention of a Commonwealth that has the sea for a next neighbor, and hangs the sign of the wealth of the sea in its hall of legislation.

GEORGE D. ROBINSON, *ex officio*.

OLIVER AMES, *ex officio*.

HORACE E. SCUDDER.

ADMIRAL P. STONE.

ABBY W. MAY.

MILTON B. WHITNEY.

FRANCIS A. WALKER.

EDWARD D. CARRIGAN.

ELIJAH B. STODDARD.

ALONZO A. MINER.



REPORTS OF VISITORS

OF THE

NORMAL SCHOOLS.



STATE NORMAL SCHOOL, BRIDGEWATER.

ALBERT G. BOYDEN, A. M., *Principal.*

The power to make a normal school something different from a high school or a college, resides so much in the constant, familiar use of a clearly understood principle of pedagogy, that too much weight can scarcely be attached to the personal management of such a school. It is a matter for sincere congratulation that the school at Bridgewater has been so long under the direction of its vigorous principal. The twenty-fifth anniversary of Mr. Boyden's election to the head mastership was celebrated in Bridgewater at the annual commencement in July. Past members of the school, former teachers under Mr. Boyden, and many friends of education met to offer the principal their warm congratulation, and to bear testimony to the fidelity with which he had so long administered the important trust committed to him.

The best evidence of his work is in the present prosperous condition of the school, and in the infrequency of changes in the teaching force. At the beginning of the year, in September, 1884, Mr. Frank F. Murdock, a graduate from the four years' course in the class of February, 1879, and principal of the Morse Grammar School in Somerville, was appointed to succeed Mr. Cyrus A. Cole. Miss Edith Leonard continued to supply during the year the place of Miss Mary H. Leonard, who was unable to return to her duties. No other change has occurred among the teachers during the past year.

The most considerable advance, has been in the increased facilities for work in the teaching and study of the natural sciences. More comprehensive analyses of the subject have been made ;

sets of working specimens have been provided for each member of the class; more extended means for microscopic study and illustration have been secured; so that each student engages in direct objective study and teaching in these branches. A society called the Bridgewater Science Club has been formed, composed of members of the upper classes, graduates, and teachers in the school, whose object is to promote the study of natural science, and to provide for this school a representative collection of the minerals, plants and animals of south-eastern Massachusetts. Large additions to the cabinets have been made by the summer excursions of this club.

Both the formal and informal training in the natural sciences thus secured promises to be of great value to the pupils in the school, and through them to the children whom they will ultimately have under their charge. Valuable as the mental discipline is, which is induced by the study of scientific classification and of the more recondite processes of nature, it is of great importance that the teachers of our country schools should have that familiar acquaintance with nature which will enable them to be guides and interpreters to the opening minds of children. If the young teacher who has explored the country about Bridgewater and has studied the objects there found, acquires both the power of seeing and the power of making others see, it is reasonable to hope that when placed in charge of boys and girls in any place, this teacher will quicken observation, excite study and train those faculties of observation and analysis which often lie dormant until close and well-directed contact with nature calls them into activity.

The statistics for the year ending Aug. 31, 1885, are as follows:—

TERMS BEGAN SEPT. 3, 1884, AND FEB. 11, 1885.	FIRST TERM.			SECOND TERM.			FOR THE YEAR.		
	Men.	Women.	Total.	Men.	Women.	Total.	Men.	Women.	Total.
Members,	36	124	160	37	132	169	43	154	197
Entering classes,	13	47	60	7	25	32	20	72	92
Graduates,	3	11	14	6	27	33	9	38	47
Received State aid,	10	9	19	11	11	22	11	13	24

The whole number of students who have been members of the school is 3,073 ; 979 young men, and 2,094 young women ; 1,879 of whom — 620 young men and 1,259 young women — have received certificates or diplomas upon the honorable completion of the course of studies. Seventy-seven students — 47 young men, 30 young women — have graduated from the four years' course, which was established in 1870. Sixty-one per cent. of all admitted have graduated.

The average age of those admitted during the year was 18 years 8 months ; men, 20 years ; women, 18 years 4 months.

Of the 92 admitted, 50 came from high schools ; 17 from academies and private schools ; 17 from grammar schools ; 5 from ungraded schools ; 2 from Normal Schools ; 1 from college.

The occupations of the parents of those admitted were given as follows : Mechanics, 25 ; farmers, 17 ; merchants and traders, 12 ; physicians, 4 ; manufacturers, 3 ; teachers, 2 ; clergyman, 1 ; in the United States service, 2 ; miscellaneous, 26 ; total, 92.

Of the members of the school for this year, Plymouth County sent 58 ; Middlesex, 32 ; Norfolk, 30 ; Bristol, 21 ; Barnstable, 14 ; Suffolk, 5 ; Essex, 3 ; Worcester, 2 ; Dukes, 2 ; Hampshire, 1 ; the State of New Hampshire, 13 ; Maine, 4 ; Vermont, 3 ; Rhode Island, 2 ; District of Columbia, 2 ; New York and New Jersey, each 1 ; Nova Scotia, 2 ; Province of Quebec, 2. Totals : Massachusetts, ten counties, 168 ; other States and countries, 29.

The number of past graduates in attendance during the year has been 4 ; of college graduates on the special course, 1 ; of undergraduates pursuing the four years course, 49,—young men, 21, young women, 28 ; of students pursuing the intermediate course, more than the two years course and less than the four years, 12

Forty-three of the graduates of this year have engaged in teaching and are distributed in ungraded, primary, intermediate, grammar and high schools. Four of the last class for good reasons have been temporarily detained at home, but they will soon engage in teaching.

We desire to call especial attention to the steady increase in the number of those who give more than two years to the Normal training. It illustrates two facts, that the demand for

thoroughly trained teachers grows with the growth in importance and dignity of the teaching profession, and that the colleges do not completely supply the demand for teachers in the higher grades. It may be that our New England colleges will some day make provision for the needs of those who desire to study carefully the philosophy of teaching; they do not at present, and in consequence persons who might otherwise elect a college course, are driven to take a Normal School course instead, or they add a partial one to their completed college work. Other causes no doubt are at work, but this cause is a prominent one. It is not desirable that the Normal School, in New England at least, should attempt to do the work of a college, and it is not intended to push the Normal School in that direction, but so long as the college does not admit into its plans the specific training of teachers, it is inevitable that the Normal School should be compelled in part to share with colleges their regular work also.

The experience of the principal for a quarter of a century entitles his review of the progress of the school during that period to great weight, and it is gratifying to hear the testimony which he renders with moderation of language.

“A review” he says, “of the last twenty-five years affords gratifying evidence of the effect of Normal training in this part of the State in the better qualifications of those now admitted to the school. There is still much room for improvement in this direction. The work in many of the schools is still seriously defective, nor do all those who propose to fit themselves for teaching come from the first grade of scholarship. Notwithstanding these facts, while the school has more than twice the number of pupils it had twenty-five years ago, and the average age of those admitted remains about the same, a much larger proportion of the students now come from high schools with a wider knowledge of subjects and are able to do a better quality of work in the Normal School. The standard both for admission and graduation, has been advanced as fast as public sentiment would justify.”

The new year has opened with more students than have ever been in attendance at one time before, making it necessary to purchase new desks and seats for the school-room and for the class-rooms. New furniture is very much needed in class-

rooms, one, four and five, and a new hard-pine floor in rooms four, five, eight and nine. Tables and chairs should be in these rooms instead of settees, that written exercises, which are an essential part of the class-work, may be taken at any time. Classes must now pass to the hall for all the written exercises, often at great inconvenience to other work going on in the hall. Rooms four and five are so poorly lighted that in the cloudy and short afternoons of the winter, the class cannot proceed with their work without the aid of gas light, and piping and fixtures are required for these rooms.

In our report last year, we called attention to the growing need of the school for provision to meet the wants of the students in the way of healthful exercise and physical culture.

In our judgment the time has come when the State should make the necessary provision. It owns one and three-eighths acres of land so fully occupied by the school building and the boarding-hall, with their approaches, as to leave no room whatever for any playground for the students, of whom there are at present 185, with nine teachers. It is evident that such a family of young people, the larger number of whom make their home in the boarding house, needs to be provided with suitable means for taking that proper daily physical exercise which is essential to good health, and without which there cannot be profitable mental work. Under existing conditions, in unpleasant weather and in the colder months, which make up the greater part of the school year, when the students are necessarily much within doors, the health of the students, good order in the boarding hall, and the whole work of the school suffers much detriment from the want of regular physical exercise and training. The training and military drill, now given under most unfavorable conditions, may be made a valuable part of the school-work, if suitable facilities are given.

H. E. SCUDDER,
FRANCIS A. WALKER,
Visitors.

STATE NORMAL SCHOOL, FRAMINGHAM.

MISS ELLEN HYDE, *Principal*.

The statistics for the year 1884-85, are as follows : —

Number of pupils admitted, —

September, 1884,	38
February, 1885,	15
Total for the year,	<u>53</u>

Number admitted who are graduates of high schools, —

In September, 1884,	25
In February, 1885,	7
Total,	<u>32</u>

Number who had taught before admission, —

In September, 1884,	11
In February, 1885,	3
Total,	<u>14</u>

Average age of those admitted, —

In September, 1884,	19 years 9 months.
In February, 1885,	18 " 2 "

Whole number in school during the year, 116

Number of graduates, —

January, 1885,	10
July, 1885,	20
Total,	<u>30</u>

Residence of pupils, —

Maine,	5
New Hampshire,	8

Residence of pupils (continued).—

Vermont,	1
Rhode Island,	1
Connecticut,	3
New York,	5
New Jersey,	3
Pennsylvania,	1
Florida,	1
Michigan,	1
Massachusetts,	87
Middlesex Co.,	47
Worcester Co.,	20
Norfolk Co.,	11
Bristol Co.,	3
Plymouth Co.,	2
Essex Co.,	2
Hampden Co.,	1
Suffolk Co.,	1
Total,	<hr/> 116

Occupation of parents, —

Farmers,	35
Merchants,	20
Mechanics,	28
Manufacturers,	4
Clergymen,	4
Teachers,	3
Lawyers,	4
Doctors,	1
Postmasters,	2
Laborers,	2
Gardeners,	1
Brokers,	2
Clerks,	4
Unclassified,	6
Total,	<hr/> 116

During the year we have had five valuable lectures from Prof. Wm. P. Atkinson on Government; and one from each of the following gentlemen: Mr. W. I. Marshall, on The Arid Region of the West; Mr. C. W. Carter, on Teaching Drawing; Mr. George E. Hartwell, on Electric Lighting; Mr. G. H. Martin, on Our Aryan Ancestors; Mr. J. W. Dickinson, on Legislative Procedure; and Mr. Booker T. Washington, on the Work of the Tuskegee Normal School for colored teachers.

We have also received several valuable gifts. From Mrs. Judge Lowell, a fine portrait of her father, George B. Emerson; from Mrs. Horace Mann, a life-size bust of her husband; and from a friend, a second tennis set, which has contributed much to the health and happiness of the scholars.

The school has made three excursions; one at the beginning of the year, to the Teachers' Institute at Sherborn; in the spring, to the Middlesex County Teachers' Meeting at Lowell; and in June, by the kind invitation of the superintendent, Mrs. Johnson, an afternoon was spent in the Reformatory Prison at Sherborn.

The last legislature gave us a special appropriation for fire-escapes, of \$850.

This has been expended as follows:—

For iron balconies,	. . . . .	\$295 00
4 fire escapes,	. . . . .	211 80
Harden hand grenades,	. . . . .	33 50
Hatchets and elastic bands,	. . . . .	9 90
		<hr/>
		\$550 20
Leaving a balance unexpended,	. . . . .	299 80
		<hr/>
		\$850 00

We believe that the inmates of the boarding-houses are now safe as regards danger from fire. They have had sufficient practice in the use of the escapes, to become quite familiar with them; and the main house can be cleared in two minutes. The hand-grenades are in place on every floor in the cellar of the boarding-house, in the Haven house, and in the cellar and laboratory at the school-house.

Both boarding-house and school-house have needed a good many small repairs. They are now in better condition than usual. The grounds require a considerable outlay each year. During the past year, the grove of fine young pines on our northern boundary has been thinned. This work must be continued next year.

The health of the school was excellent during the year, with the exception of an epidemic of measles, which went through both the Normal and the practice-schools, with, however, no serious results. Miss Pratt was the last victim, and was absent

from school during the last six weeks of the year. Miss Mary L. P. Shattuck took Miss Pratt's classes, in her absence.

The spirit of the school is in every respect all that we could ask. It is but a matter of course that all, — pupils as well as teachers, — should do their best to promote the object for which the school exists; and harmony and right feeling prevail, to an extent not often reached, we believe, in any school. It is but simple justice to all that we should bear this unqualified testimony.

The only change in teachers was made at the end of the year, when Misses Kittredge and Burnham resigned, and Miss Mary L. Bridgman was appointed. Miss Kittredge and Miss Burnham had both done excellent work, and we regretted their loss; but neither was able to combine French with the other subjects required. This Miss Bridgman is able to do, and she brings to her work the experience of some years as a successful teacher.

The boarding-department is in excellent condition. The house is in good repair, well furnished and well managed, and as home-like as it is possible for such a house to be.

The practice-school is overflowing, as it has been for some years, and continues to do the best sort of work, both for its pupils and for the Normal School scholars who teach in it. A large proportion of the children are from Framingham; but there are representatives of several other towns, sent on account of the superior advantages offered by the school. If we had more room we should have many more scholars, as we have long been obliged to refuse applicants. From time to time, children have come from Marlborough, Milford, Sudbury, Southborough, Natick and Wayland. This we count of great worth, as it spreads a knowledge through the towns thus represented of the good work done by thoroughly-trained teachers. It is obviously a positive step toward increasing in all such towns the demand for better teaching. Massachusetts can ask nothing better for her people and her schools than just this demand. It is her accepted duty to meet it in such a way as to continually increase it. It is for this very purpose that she long ago established her Normal Schools, and steadily maintains and cherishes them, year by year.

From this favorable report of the condition of the school, we turn to speak of its great need of increased accommodations.

For several years it has steadily grown in numbers ; and the last class was the largest that has been admitted in thirty years. Nor is this increase at the expense of quality. On the contrary, there is an equal improvement in the character and fitness of the pupils ; an increasing proportion of young women whose antecedents have been such as make them receptive of the best influences, and able to do good work. The demand for our graduates, — as for all Normal graduates, — is increasing ; and the high schools and academies are encouraging their pupils to come to us more than ever before. To meet this gratifying condition of things, it is our intention to ask a special appropriation from the Legislature. We shall do this in the confidence that the oldest Normal School in America justifies such aid ; that it will bear any test of examination that may be applied to it, and that to the valued associations and ripened experience that age has given, it adds the vigor of youth, and the promise of continued growth in all good things.

ABBY W. MAY,

A. A. MINER,

Visitors.

STATE NORMAL SCHOOL, SALEM.

DANIEL B. HAGAR, PH. D., *Principal*.

The Normal School at Salem has closed another year of very successful work. In all departments and classes the results have been highly satisfactory, and especially so when we consider the crowded curriculum and the limited time for study, observation and training. Favored, however, with the continuance of the management which has promoted the school to the foremost rank in the country, and sustained by a zealous, efficient and faithful corps of teachers, it is but natural that the attendance at Salem is increasing and the service gratifying to the visitors, to parents and to the public.

The most happy relations exist between teachers and pupils. Economic in the administration of his trust, and at all times watchful for the welfare of the individual and the school, Mr. Hagar maintains well the policy of the State in the advancement of its teachers to the highest possible professional status. While the principal and his assistants may be able to do the increased work occasioned by over-crowded classes and the recent demand of the Board for more attention in the Normal Schools to the department of writing, it is evident that the services of an additional teacher will soon be required, for which an increase of the appropriation may be found necessary. In accordance with the general order of the Board requiring a higher standard of examinations in penmanship in the several schools, Salem has given more time than formerly to this subject, especially in blackboard work. The principles are taught to the Juniors who, when Seniors, will be required to give evidence in practice of their proficiency in movement, muscular and combined, shading and spacing. Throughout the

course all possible time will be given to blackboard work, the pupils in turn being required to teach from the board the method of general criticism and class concert movement. In the analysis of the elements of the small-letter principles, the end sought is uniformity and legibility, while, in practice with pen and crayon, both rapidity and command of movements are expected. The advance in this department we have no doubt will be fully appreciated by all interested in the most thorough professional preparation in the common school work.

Lectures have been given during the year, before the school, by the following gentlemen: Hon. C. C. Coffin on History of the United States, Dr. Beardsley on Physiology, Mr. George Hartwell on Electricity as a Motive Power, Mr. C. M. Carter on Teaching Vocal Music, Rev. B. F. McDaniel on Geology, Rev. Dr. S. E. Lane on Elocution, Dr. A. Spencer on Elocution.

The statistics of the school are as follows:—

1. The whole number of pupils belonging to the school during the year was 259.

Of this number, Essex County sent 132; Middlesex, 63; Suffolk, 11; Norfolk and Plymouth, 4 each; Worcester, 3; Barnstable, 2; and Bristol and Hampden, 1 each. The State of Maine sent 12; New Hampshire, 18; Vermont, 4; Rhode Island, 1; Connecticut, 1; Georgia, 1; and Illinois, 1.

The number present during the term which closed Jan. 20, 1885, was 211; the number present during the term which closed June 30, 1885, was 195.

The whole number of pupils that have been members of the school since its opening in September, 1854, is 2,973.

2. The number graduated from the regular course, Jan. 20, 1885, was 28; the number graduated from the same course, June 30, 1885, was 25; and from the advanced course, 2.

The whole number of graduates of the school (60 classes) is 1,435.

3. The number that entered the school, Sept. 2, 1884, was 64; the number that entered Feb. 10, 1885, was 44.

4. The average age of the class admitted Sept. 2, 1884, was 17.73 years; of the class admitted Feb. 10, 1885, 19.29 years.

Of the 64 pupils admitted to this school in September, 1884, 46 came from high schools (29 graduates, 17 undergraduates),

8 from grammar schools ; 4 from district schools ; 4 from sisters' schools ; and 2 from academies.

Of the 44 pupils admitted in February, 1885, 1 came from a normal school ; 24 from high schools (11 graduates, 13 ungraduates) ; 5 from grammar schools ; 4 from district schools ; 3 from academies ; 2 from private schools ; 2 from sisters' schools ; 1 from a college ; 1 from a seminary ; and 1 from a training school.

5. The fathers of the pupils admitted during the year are by occupations as follows : — farmers, 25 ; mechanics, 22 ; manufacturers, 16 ; traders, 15 ; agents, 6 ; miscellaneous, 24.

6. The number that received aid from the Bowditch Fund during the first term was 25 ; during the second term, 27. The number of different pupils thus aided was 37.

The number that received aid from the State during the first term was 29 ; during the second term, 29. The number of different pupils thus aided was 43.

7. Of the class admitted in September, 1884, 9 had taught school ; of the class admitted in February, 1885, 9 had taught.

8. The number of pupils connected with each of the classes during the first term of the year was as follows : — special students, 2 ; Advanced Class, 8 ; Class A (Senior), 34 ; Class B, 48 ; Class C, 48 ; Class D, 71.

The number during the second term : — special students, 2 ; Advanced Class, 7 ; Class A, 33 ; Class B, 44 ; Class C, 58 ; Class D, 51.

9. Of the 108 pupils admitted during the year, Lynn sent 9 ; Lowell, 8 ; Salem, 7 ; Gloucester, 6 ; Peabody, 4 ; Arlington, Beverly, Boston, Lynnfield Centre, 3 each ; Cambridge, Essex, Littleton, Medford, North Reading, Reading, Somerville, Swampscott, and Topsfield, 2 each ; Allston, Andover, Bedford, Chelsea, Danvers, Everett, Fall River, Georgetown, Hamilton, Hingham, Ipswich, Lawrence, Malden, Marblehead, Marshfield, Melrose, Nahant, Newton, Phillipston, Provincetown, Rowley, Salisbury, Scituate, Wenham, West Newbury, Wilbraham, and Winchester, 1 each. The State of Maine sent 7 ; New Hampshire, 5 ; Vermont, 2 ; Georgia, 1 ; and Illinois, 1.

10. During the year 41 books were added to the general library, 20 by purchase and 21 by gift.

The text-book library was increased by the purchase of 119 books.

From the foregoing statistics it is evident that the influence of this school is not only generously recognized by the district which it immediately serves, but throughout the Commonwealth, and while we appreciate its enviable record and great work of the past we can bespeak for it continued prosperity and a greater future.

E. C. CARRIGAN.

FRANCIS A. WALKER.

STATE NORMAL SCHOOL, WESTFIELD.

JOSEPH G. SCOTT, *Principal*.

The work of this school during the past year has been eminently satisfactory.

The whole number of pupils in the school during the year has been somewhat larger than during the preceding one; and, as a whole, they have been diligent, earnest and devoted to their work.

Most of the classes have been large; some large enough to compel divisions.

The corps of teachers remained unchanged during the school year; and all, without exception, have labored earnestly and faithfully, and with increased usefulness, to further the high ends for the accomplishment of which Normal Schools exist.

Not a single untoward incident, worthy of note, has marred the harmonious life of the school during the year.

Mrs. Foster has acceptably served as matron of the boarding-hall during the year, and food of excellent quality has been furnished, with the comforts of a home life, to pupils and teachers, at a price much less than board of equal excellence could possibly have been obtained in private families.

We were unable to secure a desirable night watchman for the boarding-house during the school year, but we have now secured a careful and faithful man, who entered upon his service at the beginning of the present year. The house has been further guarded against fire by a good supply of hand grenades, paid for out of the balance of the sum allowed for a night watchman.

During the vacation at the close of the school year, Miss Kniel, one of the teachers, was prostrated by a fever, and was unable to take her place at the beginning of the present year; but she has now (Nov. 3, 1885) so far recovered as to resume her duties in the school. During the absence of Miss Kniel, Mrs. Staebner, formerly Miss Emerson, taught her classes with acceptance.

With one or possibly two exceptions, all of the graduates of the past year are teaching in the Commonwealth. From one no report has been received, and from one other we have no certain information, but she is probably engaged in teaching.

It is impossible to speak with entire confidence of their success, yet we believe all those who are teaching are doing satisfactory work. No failures have been reported.

The almost universal testimony of those familiar with the work of the graduates of this school is that they "understand their business," that "they do not take time to learn," that "they do not go to seed," but that "they constantly grow in enthusiasm and in power." The constantly increasing demand for its graduates as teachers is the best tribute to the high excellence of the work of this school.

Addresses have been given during the year as follows:—

By Rev. A. D. Mayo, on "The Country Schools of Massachusetts;" by Prof. A. L. Perry, on "The Tariff;" by Prof. Bernard Bigsby, on "Arnold and Rugby;" by Dr. J. H. Vincent, on "The Chatauquan Idea;" and by C. C. Coffin, Esq., on "The Philosophy of American History."

Brief addresses on various matters pertaining to the teacher's work have been given by the Secretary of the Board of Education; by Miss Abby W. May, a member of said Board; by J. C. Greenough, President of the Agricultural College at Amherst; and by Geo. A. Walton, A. M., an agent of the Board of Education.

The statistics for the year are appended.

I. Statistics — *Westfield Normal School — 1884-85.*

	WINTER TERM.			SUMMER TERM.			FOR THE YEAR.		
	Young Men.	Young Women.	Totals.	Young Men.	Young Women.	Totals.	Young Men.	Young Women.	Totals.
Number of pupils in school,	6	126	132	6	114	120	7	148	155
Number of pupils in entering classes,	3	42	45	1	20	21	4	62	66
Number of graduates, '	-	8	8	2	9	11	2	17	19
Average age of enterers,	Yrs. Mos. 17 3.1	Yrs. Mos. 18 3.6	Yrs. Mos. 18 2.8	Yrs. Mos. 19 0.8	Yrs. Mos. 18 11	Yrs. Mos. 18 11.1	Yrs. Mos. 17 8.5	Yrs. Mos. 18 5.9	Yrs. Mos. 18 5.3
Average age of graduates,	-	21 11.4	21 11.4	25 3.6	22 0.8	22 7.9	25 3.6	22 0.2	22 4.3
Number of enterers who had taught,	-	9	9	-	6	6	-	15	15

II.

No. of counties in Massachusetts represented by pupils,	7
of States represented by pupils,	11
of families represented by pupils,	152
of towns and cities represented by pupils,	65

Number of Pupils from each County in Massachusetts represented by Pupils.

Berkshire,	18
Essex,	1
Franklin,	10
Hampden,	81
Hampshire,	17
Middlesex,	1
Worcester,	7
Total,	135

Number of Pupils from each State represented by Pupils.

Connecticut,	3
Georgia,	1
Massachusetts,	135
New Hampshire,	2
New Jersey,	2
New York,	2
Virginia,	1
West Virginia,	1
Vermont,	6
England,	1
South America,	1
Total,	155

Occupations of Parents of Enterers.

Bookkeepers,	2
Clergymen,	1
Farmers,	24
Laborers,	2
Machinists,	2
Manufacturers,	2
Mechanics,	11
Merchants,	9
Physicians,	2
Miscellaneous,	10
Total,	65

M. B. WHITNEY,
A. P. STONE,

Visitors.

STATE NORMAL SCHOOL, WORCESTER.

E. HARLOW RUSSELL, *Principal*.

This school has had a prosperous year. Good health has prevailed, earnest and effective work has been done, and the long-continued harmony among teachers and scholars has been unbroken.

Especially noticeable and worthy of mention is the enthusiasm, devotion, and what may be called professional spirit, shown by the graduating classes.

Every thesis read on graduation day dealt with some educational topic, and it was easy to see that every graduate was ready and eager for work.

Nor is this a mere passing glow of youthful feeling; the statistics herewith and heretofore published prove that it has the force to carry these graduates into the schools of the Commonwealth and sustain them there. Indeed, this purpose takes possession of the pupils very soon after they enter the school. It is in the air of the place. Students speedily learn that they are not here to be made teachers of, but are only to be helped to make themselves teachers, and they accept their share of the responsibility and set about their work with cheerful ardor. In the carrying out of this principle, there has grown up a practice which your visitors look upon with much favor, namely, that of granting to undergraduates who desire it, temporary leave of absence to engage in actual teaching for longer or shorter periods, thus interrupting their course of study for a time, to resume and finish it afterwards, with the added advantage which such experience never fails to bring. Of the last graduating class, fully one-half had taught schools of their own before asking for

their diplomas, and there are at present not fewer than seventeen pupils absent on leave and engaged in teaching. It may be added that the demand for these undergraduate teachers has been at times greater than the school could supply.

The visitors are always pleased to find in this school a remarkable absence of dull routine. While the prescribed work of the course appears to be steadily going forward, there is usually, in addition to this, some special emphasis, some experiment in a new direction, which gives fresh interest and animation to the school, and manifests in teachers and students alike, an alert and progressive spirit. During the past year, for example, there has been a noteworthy effort to enlarge and improve in a practical way the study of psychology, by making the systematic objective study of children a prominent part of the work of the more advanced classes. Pupils are first made acquainted with the objects and methods of such study, and are then encouraged to make independent personal observation of children,—their nature and instincts, their plays and games, their ideas and modes of thought and feeling, their habits, aptitudes, acquirements, etc.,—and to record the results upon blanks prepared for the purpose. Several hundred such records have already been made, and the experiment is gathering interest and precision day by day.

This undertaking has already attracted the attention and received the approval of several prominent educators, among whom may be mentioned Dr. Stanley Hall.

The advantages of the study and the method are easily seen, especially the two following points: first, that it helps to form a habit of original scientific investigation; and secondly, that it tends to bring those who are to become teachers into intelligent sympathy with children.

Mr. James S. Whitman of Boston, a graduate of Oxford University, has rendered valuable service this year on the teaching staff, as instructor in English and History.

It is much to be regretted that the school grounds, which possess so many natural advantages, should continue to suffer for lack of a suitable enclosure.

The small appropriation made two years ago for a fence has indeed enabled a good beginning to be made, but the work cannot be completed without an increased allowance of money.

3. Average age of pupils admitted : —

In February,	19 years, 1 month.
September,	18 years, 6 months.

4. Of the pupils admitted, there were : —

From Worcester County,	58
Franklin County,	1
Middlesex County,	1
Connecticut,	2
Colorado,	1
Pennsylvania,	1
Total,	<hr/> 64

5. Occupations of pupils' parents : —

Professional,	3
Mercantile,	13
Skilled labor,	23
Unskilled labor,	18
Unknown,	7
Total,	<hr/> 64

6. Number in graduating classes : —

In January,	22
June,	14
Total,	<hr/> 36

7. Average age of graduates : —

In January,	20 years, 7 months.
June,	22 years, 3 months.

8. Number of the above graduates now teaching (November, 1885) : —

January class (all),	22
June class (all but two),	12
Total,	<hr/> 34

9. Increase of numbers : —

Number of pupils in 1884,	174
of pupils in 1885,	198
Increase,	<hr/> 12

Number of graduates in 1884,	24
of graduates in 1885,	36
Increase,	<hr/> 12

10 Additions to the library:—

Text books,	.	.	.	.	.	.	.	81 volumes.
Reference books,	.	.	.	.	.	.	.	97 "
Total,	.	.	.	.	.	.	.	178 "

11. Number of volumes now in the library:—

Text books,	.	.	.	.	.	.	.	3,738 volumes.
Reference books,	.	.	.	.	.	.	.	1,973 "
Total,	.	.	.	.	.	.	.	5,711 "

F. B. STODDARD,
A. P. STONE,

Visitors.

Nov. 5, 1885.

Certificates of required attainments in the several classes were given as follows : —

Certificate A,	.	.	.	.	.	.	.	.	.	40
B,	.	.	.	.	.	.	.	.	.	13
C,	.	.	.	.	.	.	.	.	.	3
D,	.	.	.	.	.	.	.	.	.	6
Diploma, A and C,	.	.	.	.	.	.	.	.	.	3
A, B and D,	.	.	.	.	.	.	.	.	.	6
A, B, C and D,	.	.	.	.	.	.	.	.	.	1
Total,	.	.	.	.	.	.	.	.	.	<hr/>72

During the year ending September, 1885, students of the school have been appointed to teach drawing in the following places : —

North Adams,	.	.	.	.	.	.	.	.	.	1
Boston,	.	.	.	.	.	.	.	.	.	10
Kingston, Can.,	.	.	.	.	.	.	.	.	.	3
Baltimore, Md.,	.	.	.	.	.	.	.	.	.	1
Lowell,	.	.	.	.	.	.	.	.	.	1
Quincy,	.	.	.	.	.	.	.	.	.	2
Malden,	.	.	.	.	.	.	.	.	.	2
Lawrence,	.	.	.	.	.	.	.	.	.	1
Nashua, N. H.,	.	.	.	.	.	.	.	.	.	1
New Orleans, La.,	.	.	.	.	.	.	.	.	.	1
Chicago, Ill.,	.	.	.	.	.	.	.	.	.	1
Joliet, Ill.,	.	.	.	.	.	.	.	.	.	1
Winona, Minn.,	.	.	.	.	.	.	.	.	.	1
Another place,	.	.	.	.	.	.	.	.	.	1
Total,	.	.	.	.	.	.	.	.	.	<hr/>27

The annual graduating exercises of the school were held on June 23, in the

BOSTON ART CLUB GALLERY,

which was kindly proffered for the occasion. The work of the year was displayed upon the walls, in the order of the classes, showing its systematic development from the beginning to the end of the four years' course. The original designs, which were of an entirely practical character, constituted an especial feature of the exhibit. The whole was most warmly commended by competent judges.

Among the exercises of the occasion were lessons in teaching, practically illustrated. Sometimes the lessons and illustrations were given by the same pupils. Thus, Miss Jennie N.

Prince and Miss Charlotte A. Kendall, of Class A, taught a group of primary school children in the presence of the audience; Miss Fannie C. McIntosh and Miss Alice M. Fifield, also of Class A, gave lessons in historic ornament; methods of working in oil and water colors were treated by Mr. Henry T. Bailey and Miss Fannie H. Smith, and illustrated by Mr. MacNeil, and Misses Calrow, Cleaves, Dutton, Emmins and Spaulding, all of Class B; lessons in perspective and shadows were given by Messrs. Judkins and Bancroft of Class C; and a paper on design in the round by Miss Emma W. Kaan, was illustrated by Messrs. Sweeny and Skinner, and Misses Lewis, Munsell and Vance, all of Class D. These exercises awakened the most eager interest on the part of the entire audience, and gave ample proof of the fidelity of both teachers and pupils.

At the close of the exercises, remarks warmly congratulatory of the work of the school were made by Senator Marden of Lowell, Representatives Smith of Worcester and Stevens of Lowell, and among others Mr. Walworth of Walworth Manufacturing Company.

The plan of normal instruction and practice projected a year ago is systematically pursued, and is proving very satisfactory. The bringing of the pupils before the whole school, by previous appointment, furnishing opportunity for ample preparation of the lessons to be given, develops confidence and self-reliance, and gives them a ready command of whatever knowledge and skill they may have attained.

The wisdom which originally established the school is justifying itself more and more year by year. It meets a pressing public necessity. The rudimentary instruction of the schools previous to the introduction of drawing prepared the young for honorable careers in many a noble pathway. That instruction put them *en rapport* with the wisdom of the ages. Their introduction to books enabled them to consult the experience of the good men who had preceded them.

The reader with books at his command may become the peer of the greatest and best. The broad ways of literature are ever green fields for the scholar's roaming. The instrumentalities of literature make accessible to him, not only the vast populations of his own time, but generations that have not yet risen to the light.

But these rudiments of an education must be supplemented whatever may be one's calling in life. To literary pursuits they are an introduction in kind; to most other pursuits there must be an abrupt turning away from the school elements, not to a field where they are useless (for they are useful everywhere), but to a disjoined and separate field, involving other elements, and calling for an altogether different kind of instruction. From A B C to literature is a development; but from A B C to carpentry is a new departure.

The introduction of industrial drawing into the public schools furnishes those elements of an education which bear a relation to the constructive and manufacturing arts, similar to the relation which the ordinary curriculum of the schools bears to literary and untechnical pursuits. The Normal Art School was established to make possible in the public schools adequate instruction in drawing. The school is fulfilling the ends for which it was created.

The Principal, by his attainments and large experience in the staple work of the school, by his genial administration, his appreciation of the faithful labors of his corps of instructors, and by his sympathy with the pupils in their efforts is securing highly satisfactory results.

Such has been the growing appreciation of the work of the school that there is no longer any question of its continuance. Not only do the estimates for its annual support take their place in the budget of educational appropriations and pass unchallenged; but our legislature at the last session made an appropriation of \$85,000 for the erection of a suitable building for its future accommodation. Most admirable plans have been prepared by Messrs. Hartwell and Richardson, and approved by the Governor and Council. The piling and foundations have been put under contract and the work is now in progress. It is probable that the entire building will be under contract before January. We hope to have it completed by the opening of the school year 1886-7.

A. A. MINER.

ABBY W. MAY.

FRANCIS A. WALKER.

H. E. SCUDDER.

FORTY-NINTH ANNUAL REPORT

OF THE

SECRETARY OF THE BOARD.

SECRETARY'S REPORT.

To the Board of Education.

I respectfully present herewith the Forty-Ninth Annual Report of the Secretary.

SUMMARY OF STATISTICS FOR 1884-85.

Number of cities and towns: Cities, 23; towns, 324.

All have made the annual returns required by law.

Number of public schools,	6,447
Increase for the year,	89
Number of persons in the State between the ages of 5 and 15, May 1, 1884,	343,810
Increase for the year,	7,615
Number of pupils of all ages in all the public schools during the year,	339,714
Decrease for the year,	2,298
Average membership of pupils in all the public schools during the year,	282,154
Increase for the year,	4,913
Average attendance in all the public schools during the year, Increase for the year,	253,955
Increase for the year,	5,787
Per cent. of attendance based upon the average membership,	.90
Number of children under 5 years of age attending the public schools,	1,465
Decrease,	52
Number of persons over 15 years of age attending the public schools,	25,498
Increase for the year,	730
Number of persons employed as teachers in the public schools during the year: men, 1,061; women, 8,460; total, . . .	9,521
Number of teachers required by the public schools, . . .	8,177
Number of teachers who have attended Normal Schools, . .	2,866
Increase for the year,	122
Number of teachers who have graduated from Normal Schools, Increase for the year,	2,392
Increase for the year,	152
Average wages of male teachers per month in public schools,	\$120 72
Increase,	\$12 70

Average wages of female teachers per month in public schools,	\$43 85
Decrease,	\$0.33
Aggregate of months all the public schools have been kept during the school year,	59,230-12
Average number of months the public schools have been kept for the entire year,	9-4
Number of high schools,	224
Number of teachers,	644
Number of pupils in high schools,	20,439
Amount of salaries paid to principals of high schools, . . .	\$255,828 25
Evening schools: Number, 142; kept in 38 cities and towns.	
Number of teachers, 621; whole number of pupils, 15,422; men, 12,104; women, 3,318; average, 8,447; number of evenings, 5,251; expense,	90,124
Amount raised by taxation for support of public schools, including only wages of teachers, fuel, care of fires and school-rooms,	\$4,675,882 44
Increase for the year,	\$151,511 41
Expense of supervision of the public schools,	193,216 34
Salaries of superintendents, included in the above,	139,613 88
Expense of preparing and printing school report,	12,288 72
Expense of sundries, — books, stationery, globes, maps, etc., .	588,760 38
Amount expended in 1884-5 for new school-houses,	822,028 62
Amount expended for alterations and permanent improvements in school-houses,	382,873 00
Amount expended for ordinary repairs,	183,943 76
Amount of voluntary contributions to public schools, . . .	2,017 41
Amount of local school funds, the income of which can be appropriated only for the support of schools and academies, .	1,994,786 15
Income of local funds appropriated to schools and academies, .	104,575 02
Income of funds appropriated for public schools at the option of the town, as surplus revenue, tax on dogs, etc.,	91,446 56
Income of State school fund paid to cities and towns in aid of public schools for the school year 1884-5,	67,972 77
Of this amount, there was appropriated for apparatus and books of reference,	3,322 91
Aggregate returned as expended upon public schools alone, exclusive of repairing and erecting school-houses,	5,631,584 62
Of the above, to each child in the State between 5 and 15 years of age,	16 38
Including in the aggregate above the expense of repairing and erecting school-houses, the sum is	7,020,430 00
To each child in the State between the ages of 5 and 15 years, .	20 42
Percentage of valuation of 1884 appropriated for public schools, including only wages of teachers, fuel, care of fires and school-rooms, . . . . .	.002 $\frac{71}{100}$
Percentage of valuation of 1884 appropriated for public schools, including all the items in the last aggregate above, .	.003 $\frac{99}{100}$

Number of academies,	69
Whole number of students for the year,	9,346
Amount of tuition paid,	\$471,246 03
Number of private schools,	364
Whole number attending for the year,	25,626
Estimated amount of tuition,	\$375,005 87

ANALYSIS OF THE RETURNS.

The returns made by the cities and towns of the State show that the public schools retain the place which they have always held in the esteem of the people, and grow with the growth of the State in population and wealth.

An increase of 7,615 in the number of persons in the State between 5 and 15 years of age was provided for by establishing 89 new schools.

The increase in the average membership of the schools was 4,913. The ratio of the average membership to the whole number of children of school age shows a slight diminution from year to year. For 1880-1 it was .828; for 1881-2 it was .825; for 1883-4, .824; for 1884-5, .820. This diminution corresponds to a steady decrease in the number of very young children enrolled in the schools, and probably is due to a more enlightened public sentiment as to the proper age at which school life should begin. It is a question whether the organization and methods of the public schools are adapted to children below the age of six years. If children attend at an earlier age than that, the school must be either a nursery or a kindergarten.

While the average membership has increased 4,913, the average attendance has increased 5,787, raising the ratio of attendance to 90 per cent. An examination of the returns from individual towns shows that the attendance ranges from 80 per cent. to 98 per cent. If the same effort were made in all the towns which is now made in many of them, the waste involved in irregular attendance might be considerably reduced.

The number of teachers required by the schools was 8,179. The number actually employed during the year was 9,521. This shows that in a large number of schools the teachers are frequently changed. In some of the counties, an average of 25 per cent. to 40 per cent. of the schools have more than one teacher during the year. If the teachers in the country towns

were elected for the year instead of for the term, as is now the practice, the change would conduce to permanence, the office of teaching would be more honored and the schools saved from loss.

The number of graduates from Normal Schools employed as teachers has increased 152. This bears so large a ratio to the whole number of persons graduated by the Normal Schools during the year as to indicate that nearly all these persons enter at once upon teaching, and that a large proportion of them continue in the work.

The growth in the evening schools is noteworthy. The number of schools increased from 125 to 142; the number of pupils from 13,251 to 15,422; and the average attendance from 6,975 to 8,447. They were kept an average of 37 evenings each. There is still a large opportunity, in the manufacturing towns and cities, to supplement in this way the ordinary work of the public schools. A slight decrease in the number of high schools reported, from 228 to 224, is due rather to a change in name than to any actual change in the character of the schools. The confidence of the people in these schools nowhere shows any signs of weakening. On the contrary, the number and elegance of the new buildings recently erected for their use shows that they continue to have a generous support. The aggregate returned as expended upon the public schools, exclusive of erecting and repairing buildings, was \$5,631,584.62. This was an average to each child in the State between the ages of 5 and 15 years, of \$16.38, an increase of \$0.98.

Including the expense of erecting and repairing school buildings, the aggregate expenditure was \$7,020,430, an average to each child of \$20.42, an increase of \$1.08.

A considerable part of this increase resulted from the operation of the new text-book law, which required the towns and cities to provide text-books and supplies without expense to the pupils. This law became operative in August, 1884, so that but a part of the annual expense appears in these returns.

The whole amount expended upon the public schools during the year 1884-5, was about four mills upon each dollar of taxable property in the Commonwealth.

ACCURACY OF THE RETURNS.

Committees are urged to give especial care to the preparation of the school returns required by law. It is self-evident that the value of statistics depends on their accuracy. These returns form the only basis upon which to found a just estimate of the progress which the State is making in its provision for popular education, and they should be as exact as possible.

The instructions printed on the school-registers and on the blanks furnished to the committee are believed to be specific enough for all purposes. If persons whose business it is to fill out these blanks are in doubt as to the meaning of any question, additional information will gladly be given by the Secretary of the Board of Education.

The items under the title "Cost of Schools" should be classified with especial care, as the relative rank of the towns in the counties and in the State is made to depend upon it, and mistakes in the returns might do an injustice to many towns.

The committees should see that the law requiring the registers to be "properly" kept is complied with by all the teachers, in order that the statistics concerning enrolment and attendance should represent the facts.

The number of teachers *required* in the schools is not necessarily the same as the whole number *employed* during the year. The first item is the number necessary to give to each school one teacher and such assistants as the organization calls for.

If no changes in the corps of teachers occurs during the year this number will also be the whole number of different teachers employed. But if changes occur during the year, so that different persons are employed in the same school in successive terms, the returns should show this fact.

SPECIAL INSTITUTIONS.

In addition to the amount paid for public schools, Massachusetts expended in 1885:—

For the deaf and dumb,	\$32,070 41
blind,	30,000 00
feeble-minded,	11,183 41
children of Primary School at Monson,	53,446 56
boys at the Lyman School for Boys at Westborough,	29,314 21
girls at State Industrial School, Lancaster,	217,041 92

DEAF-MUTES AND BLIND.

The deaf-mutes depending upon the State for their education have been cared for, as in previous years, in the American Asylum at Hartford, the Clarke Institution at Northampton, and the Horace Mann School in Boston. The blind children have been supported at the Perkins Institution in South Boston.

AMERICAN ASYLUM.

While all the institutions for the education of deaf-mutes have the same aim, — to prepare their pupils to take their places in society as intelligent and useful and happy members, — they differ in the means used to bring about this end. The American Asylum and the Clarke Institution are boarding schools. The Horace Mann School is a *day* school. The Horace Mann and the Clarke Institution are alike in ignoring sign-language and working to bring their students into communication with their fellow-beings through articulate speech. The American Asylum, while making some concessions to the friends of articulate speech, retains the sign-language as the chief means of communication for congenital mutes. The most important facts which the principal of this school has to report for the year are the preparation of two elementary books adapted to the instruction of deaf-mutes, and the introduction of the type-writer as an aid in making the student familiar with printed language.

CLARKE INSTITUTION.

The eighteenth annual report shows this institution to be in a flourishing condition and carrying on its beneficent work with the earnestness and wisdom which have characterized its management from its inception.

The number of pupils enrolled during the year was 95. The largest number present at any one time was 93, and the smallest 90; boys 47, girls 46. There were in the Primary Department 54, and in the Grammar Department 39; boarders 90, day-pupils 3. Seventy-five were from Massachusetts, four from Vermont, two each from Connecticut, New Hampshire, New York, Ohio and Missouri, and one each from Indiana, Iowa, Utah and Canada.

The school expenses proper have been, for the year, \$26,655.88. The finances are in a satisfactory condition. The fund is not only unimpaired, but the present market value of the securities exceeds their original cost even more than last year. The income from the fund, during the year, has been \$16,925.42. The debt has been paid, and a reduction in charges, both to the State and to individual patrons, is contemplated at the meeting of the Corporators in March next.

There seem to be special reasons for giving to these children the discipline of manual industry and some technical knowledge gained by practice. It promises to make it easier for them to gain a foothold in society after leaving school and more readily to take up the work of self-support. At Northampton seventeen of the older boys have been instructed in carpentry and cabinet work, and more and better results have been achieved than during any previous year. A small building has been framed, erected and covered, almost entirely by these pupils, and work has been done in ash and black walnut furniture which would be creditable to the average mechanic. The older girls have assisted in light housework and been instructed in sewing.

A large part of the report is given to the advocacy of a different policy for the State in providing for its deaf and blind children. This argument is presented in full as follows :—

“Our Commonwealth has always occupied an advanced position in educational matters, and her appropriations for the unfortunate are liberal. But her provision for the education of the deaf and the blind is attended with a discrimination and with conditions, which seem hardly just, and hardly in keeping with the spirit of her public school system. That system is based upon the idea that ignorance jeopardizes the well-being of the community, and that self-protection requires the State to give, at least, an elementary education to all. Hence it imposes the burden not upon parentage, but upon property. It asks no parent whether he or she is able to pay tuition or appreciates education, but says imperatively, send your child to school ; if you possess nothing, it will cost you nothing, not even an humiliating avowal of poverty ; tax-payers, whether having children or not, are to defray the expense. A large proportion of the children of this State receive their schooling at no other cost to their parents than a poll tax, and a multitude without even this small tribute. Yet neither the parents nor the children are considered the recipients of charity. The prop-

erty owner bears the burden. He is taxed municipally, but under State law, to build, equip, repair, and heat school-houses; to pay the salaries of teachers and superintendents; to furnish free text-books to rich and poor alike; to carry to school such pupils as live remote from the school-house, if so his municipality votes; to maintain schools for drawing and evening schools; and to give to any who may desire it, a gratuitous preparation for any College in the country for either sex. He is taxed by the State directly, to pay the cost of educating indigent defective children, board included; to erect, equip, and maintain six Normal School establishments, one for Art included, and to furnish free tuition and free text-books to all the pupils, as well as pecuniary aid to those who need; to erect, equip, and keep in serviceable condition the State Agricultural College buildings, and to pay \$10,000 a year to maintain free scholarships therein, as well as some \$2,000 a year for the same purpose in the Worcester Free Institute.

“If this tax-payer happens to have a child of four senses instead of five, all that has been exacted from him for educational purposes avails him nothing. He must personally pay, not merely for the board, but for every item in the cost of its education, undiminished even by that pittance from the School Fund which is appropriated for every child of five senses.

“Deaf and blind children are counted in to draw ‘school money’ for their respective towns, but counted out in its distribution.

“If this tax-payer is the owner of only an humble estate, and does not feel quite equal to his exceptional burden, he must take the attitude of a mendicant; declare in prescribed form his inability to educate his own child; get his veracity officially certified; and then ask the State to do, what it does for three hundred and forty thousand children without the asking, give *his* child free schooling! He can escape from the burden or the humiliation only by letting his child grow up in ignorance, which no State law forbids. If he cannot pay the cost at an Institution, of course he cannot hire a competent private teacher, even if one is attainable, for that is still more expensive.

“The requisite qualifications on the part of parents and relatives to instruct deaf-mutes are too rare to have significance in this connection.

“Similar discrimination and conditions are in force, we believe, in the other New England States, as well as in New York and Pennsylvania. These States, with Massachusetts, early made some provision for the education of the defective classes. They did it at a time when ideas with respect to general education were less developed than at present; when it was not yet a postulate that all the children of the State have a claim on the State for the means of education; when the deaf and the blind were too few in number to be supposed a signif.

icant element in society ; when the prejudice against the mental capacity of the speechless was not altogether dispelled ; in short, when the education of the defective classes was considered a matter of humanity and charity, rather than of State obligation or State policy. It is natural that this early provision should long retain some of its original features, from the mere force of precedent and usage.

“But in States organized more recently, and since broader views on the subject have gained currency, no such discrimination is made nor conditions imposed. All property is taxed for the education of all, and the possession of four senses instead of five makes no difference in the application of the proceeds.

“The Deaf-Mute Institution of Illinois numbers more pupils and teachers than any other like institution in the world ; yet we have been assured by an official of that State, well known to philanthropists throughout the country, that no discrimination between rich and poor would there be tolerated ; that proffered payment for his child by the wealthiest tax-payer would not be received, and that the same rule prevailed, as he believed, in all the Western and North-western States. We have not official information from all these States, but we know the same law prevails in Minnesota, Iowa, and Nebraska, and we have the declared belief of the Principals of their several deaf-mute institutions that such is the fact universally in the great North-west.

“In Kentucky, tuition, which is generally about one-third of the whole cost, is free to rich and poor alike, and only board, within the limit of \$140 a year, must be paid by the parent if able. In Maryland the school tax is fixed and levied by the State, the rate being thus everywhere the same, and the proceeds are applied according to exigencies. In this way the education of the defective classes is provided for without invidious discrimination, and the wealthier portions of the State are made to contribute to the educational facilities of the poorer portions. No such disparity of burdens or of benefits is possible as exists under our own system of compulsory, municipal, school taxation, whereby the rate in one part of the Commonwealth is less than two mills on the dollar, while in another part, with shorter school terms, lower salaries and of course inferior teachers, the rate is three times two mills.

“In the comparatively poor British province of Nova Scotia, every deaf child between eight and eighteen years of age is unconditionally admitted and educated at the Halifax Institution, at public expense. No man is first taxed to educate everybody's children but his own, including the defective, and then left to bear his burden unaided, nor is any parent humiliated by a required confession of poverty as a condition of educational help.

“It would seem much to be desired that our Commonwealth, confessedly a pioneer in the past, in matters of education and philanthropy, should put herself on a level with other States more advanced in this particular. Statistics show that she makes but a pitiful saving to her treasury by the existing discrimination and conditions. During the past five years, beginning with 1879–80, Massachusetts pupils in the Clarke Institution averaged 71 per year. Only during the second of these years and half of the last year, was any pupil paid for by a parent, and then only a single one. During the same five years, Massachusetts pupils in the Hartford Institution averaged 66 per year. During the first year only was a single pupil paid for, and then not by a parent, but by friends, whether from compulsion of law, family pride, or charity, does not appear.

“During the same period, Massachusetts pupils in the Horace Mann School at Boston averaged $74\frac{1}{5}$ per year. This is a school for day pupils only, and the charge for tuition is \$100 annually. No party other than the State has paid this charge for any of these pupils during any of these years, with a single exception during the last year. The authority for these statements is the Principals of the Clarke and Hartford Institutions and the Auditing Clerk of the school officials at Boston.

“It thus appears that the State has saved by the existing discrimination, during the last five years, \$300 at the Northampton, possibly \$175 at the Hartford, and \$100 at the Boston, Schools for the Deaf, an aggregate of \$575, and an average of \$115 per year, a little more than half the cost per year to the State of a single pupil in our Institution. Of how many deaf children the education has been prevented, or injuriously delayed by this discrimination, we have no statistics. Probably it had somewhat to do with the fact that 100 deaf persons in Massachusetts between five years and twenty years of age, with name and residence, were reported in the national census of 1880 as not being and never having been at school.

“It is hardly to be supposed that pecuniary inability characterizes the parents of the deaf so almost universally as the foregoing statistics would imply. The probability is that the disposition of a few well-to-do parents to declare their inability, and the readiness of town and city officials to endorse such declarations, are quickened by the felt unfairness of the existing law. However this may be, certain it is that the abolition of the present discrimination and conditions would add no serious burden to the Commonwealth, while it would give congruity to her educational legislation; would place her in this respect, as she already is in others, in the front rank of liberal States; would take away from ignorant and selfish parents all pretext for the detention of deaf and blind children from school, and thus encourage and

facilitate the education of two most unfortunate classes. Deaf-mutes are, we believe, the only unfortunate class for which the Commonwealth has never had to make any outlay in brick and mortar, and the yearly cost of whose instruction is greatly lessened to the State by the national endowment of the Hartford Institution, the private endowment of the Clarke Institution, and the partial support of the Horace Mann School by the city of Boston.

“ If it be objected that to make the schooling of all deaf-mutes free is to pay for their board, and thus do better by them than is done by hearing children, the reply is :

“ First, that somewhat more than one-third of the deaf pupils of Massachusetts are now sent to the Boston School, and are subject to charge for tuition only.

“ Secondly, the cost of tuition at the Clarke and Hartford Institutions cannot be less than at the Boston School, which is considered reasonable at \$100 per year for each pupil. Yet the entire charge at each of the two Institutions is, or speedily will be, but \$175 per year, leaving but \$75 to be set down to the account of board ; the balance of the cost being defrayed by their endowments.

“ Thirdly, the State brings schooling to the doors of hearing children, and if any live at a very inconvenient distance, it authorizes the daily transportation of rich and poor alike at public expense, because it costs less to bring the children to the school than to bring the school to the children. By parity of reason, tax-paying parents of the deaf are entitled to the benefit of the same principle. It costs less to board their children at an Institution than would their daily transportation to school, or their education in their own town.

“ Fourthly, parental solicitude and yearnings, especially on the part of the mother, are generally in proportion to the depth of a child's misfortune. The more unfortunate the child, especially if young, the harder to relinquish its custody and care to strangers at a distance. No parent worthy of the name would part company with such a child for the pitiful equivalent of its board. When such parting is consented to, it is a concession to the economy of the State in its *professed* policy of giving free schooling to all its children.

“ Fifthly, many a New England youth, for the purpose of attending school, pays for board in some family by personal service out of school hours and on non-school days. Of all such equivalent for board, those parents of the deaf are deprived whose children at a serviceable age are sent to a distant Institution. Payment for the board of such children at the Institution is only a *quid pro quo* for the loss of that society and service which the parents of hearing children enjoy by reason of having the school brought to their own doors.

“ A former Secretary of the Massachusetts Board of Education,

Hon. Joseph White, in his report for 1875-6, says: 'I cannot refrain from the renewed expression of the opinion which I have long entertained, that is not creditable to us, nor quite consistent with our boasted theory that a good education is the birthright of every child in the Commonwealth, and therefore our schools are perfectly free, while the blind and the deaf-mute, the ones most needing aid, can only receive it on the plea of poverty. Nor can any State, whose social and civil institutions are founded on, and are the natural outgrowth of, intelligence and virtue, afford to permit any class of her citizens, even though small in numbers or crippled by misfortune, to be shut out for any reason from those privileges of public instruction which are the source of both intelligence and virtue.'"

HORACE MANN SCHOOL.

The sixteenth year of the Horace Mann School began on Sept. 8, 1884, with seventy-five pupils, two of whom had just entered. Of the eighty-two members reported in the June previous, one from a distant State was unable to return; one was placed under private instruction; one was sent to the Clarke Institution at Northampton; one who had been in the school nearly two years was needed in her home; and five left to go to work.

During the school year 1884-5, twelve new pupils were admitted, two former pupils were readmitted, and five were discharged. Of the latter number, one was transferred to the American Asylum at Hartford, because of the death of his mother, and four went to work.

At the close of the year in June, 1885, there were eighty-one pupils belonging to the school, — forty boys and forty-one girls. Fifty of this number belonged in Boston; twenty-seven came from towns in the vicinity; one was from Connecticut, and one from New Hampshire. All, except the two from other States, lived in their homes.

By an act of the legislature, approved April 29, 1885, the Commonwealth has generously granted to the city of Boston the perpetual right to use a valuable lot of land on the southerly side of Newbury Street, a short distance easterly from Exeter Street, for the purpose of erecting and maintaining thereon a school building for the use of the Horace Mann School. The lot is seventy-five feet in width, and one hundred and twelve feet in depth, and adjoins the estate of the Hollis

Street Church. The grant is made upon the condition that the city shall, within three years from the date of the passage of the act, erect upon the lot a school building suitable for the use of this school, and thereafter maintain the school as at present. The land is well adapted for the purpose, and it is earnestly hoped by the committee that the city council will soon make provision for erecting upon it the new school building which has long been so urgently needed.

The work of the school during the last year was, in many respects, very satisfactory. Every added year of experience brings greater ability on the part of the principal to direct the instruction, and greater skill on the part of the teachers to carry out the working plans in the various classes.

The plan of instruction in sewing and in manual training, as given in the previous report, was continued last year. Boys from this school shared instruction in the use of tools with boys from other public schools, and the teacher of the class states that their interest and progress equalled that of the boys who are not deaf.

Opportunities for this industrial training have been given three years only ; but reports are received already of its usefulness to pupils who, having left school, are engaged in various occupations.

Miss Manella G. White presented her resignation on February 11, after more than ten years of devoted service. Her heart was in her work, and she was the personal friend of all her pupils. She was succeeded by Miss Caroline T. Keith, a young teacher of much promise, but whose failing health soon obliged her to resign. We grieve to add that her death occurred in May. Miss Eleanor Le F. Morrison succeeded her, and, after acceptable service as temporary teacher, was appointed, June 22.

STATISTICS OF BENEFICIARIES.

Clarke Institution.

Number of Massachusetts beneficiaries Jan. 1, 1885,	.	.	.	.	.	72
“ admitted during the year,	.	.	.	.	.	11
“ discharged during the year,	.	.	.	.	.	12
“ in the institution Jan. 1, 1886,	.	.	.	.	.	71

BOARD OF EDUCATION.

Horace Mann School.

Number of Massachusetts beneficiaries Jan. 1, 1885,	. . . . .	77
“ admitted during the year,	. . . . .	8
“ discharged during the year,	. . . . .	13
“ in the institution Jan. 1, 1886,	. . . . .	72

American Asylum.

Number of Massachusetts beneficiaries Jan. 1, 1885,	. . . . .	62
“ admitted during the year,	. . . . .	6
“ discharged during the year,	. . . . .	11
“ in the institution Jan. 1, 1886,	. . . . .	57
Whole number of beneficiaries in all the institutions Jan. 1, 1886,	. . . . .	200

AMOUNT EXPENDED FOR THEIR INSTRUCTION DURING THE YEAR.

Paid Clarke Institution.

72 beneficiaries for quarter commencing Jan. 1, 1885,	\$3,423 79
72 beneficiaries for quarter commencing April 1, 1885,	3,566 50
72 beneficiaries for quarter commencing July 1, 1885,	3,546 50
68 beneficiaries for quarter commencing Oct. 1, 1885,	3,333 00
	—————\$13,869 79

Paid Horace Mann School.

70 beneficiaries from Feb. 1, 1885, to July 1, 1885,	. \$3,462 86
72 beneficiaries from July 1, 1885, to Feb. 1, 1886,	. 3,671 09
	————— 7,133 95

Paid American Asylum.

62 beneficiaries for quarter commencing Dec. 1, 1884,	\$2,712 50
63 beneficiaries for quarter commencing March 1, 1885,	2,756 25
63 beneficiaries for quarter commencing June 1, 1885,	2,756 25
57 beneficiaries for quarter commencing Sept. 1, 1885,	2,493 75
Clothing furnished beneficiaries for the year ending	
July 1, 1885,	. . . . . 347 92
	————— 11,066 67

Aggregate amount expended during the year, . . . \$32,070 41

PERKINS INSTITUTION AND MASSACHUSETTS SCHOOL FOR THE BLIND.

This institution is a seat of learning for children and youth, and not an asylum or retreat for adult and helpless persons. It constitutes an integral and inseparable part of the school

system of Massachusetts, and it was upon this ground that it was placed by law under the supervision of this Board. Its claim upon the Commonwealth for aid and support rests upon the fact that it is the duty of the State to provide the means of instruction for its sightless as well as for its seeing children to the extent of their capacities.

By supplementary legislation, obtained last year, the relations of this Board to the institution have been clearly defined and made closer, and all suitable applicants for admission are recommended to the Governor by the Secretary.

Object-teaching has always been one of the main features in the methods of instruction employed in this institution, and it has been pursued with earnestness and the highest degree of efficiency. During the past year a step forward has been taken in this direction, and many of the younger pupils have been trained, not only in the usual careful handling and examination of educational objects of all kinds, but have also learned to make articles or models of various shapes and forms out of clay and other pliable materials. This innovation is the outcome of the manual dexterity and of the ideas of shape and form developed in the kindergarten classes.

The movement for the establishment of a separate kindergarten and primary school for little blind children between the ages of five and nine years has made satisfactory progress, and promises to be crowned with complete success. An eligible estate has been purchased in Roxbury, at a cost of \$30,000, and the work for the erection of a new building large enough to accommodate from thirty-five to forty persons is already begun. The infant institution will be organized next autumn, and will open its doors to as many pupils as its means will allow. No application has so far been made to the State for aid, and we understand, that the managers and promoters of this beneficent enterprise are striving to enlist the interest of all philanthropic and benevolent citizens in its behalf, and to place it on a sound financial basis, by means of voluntary gifts and contributions from the community at large.

According to a report presented to this Board, the financial status of the institution may be summarized as follows : —

Receipts.

Cash in the treasury Oct. 1, 1884,	\$799 19	
Annual appropriation from the State of Massachusetts,	30,000 00	
Income from all other sources,	32,391 08	
Legacies and donations,	1,622 70	
	<hr/>	\$64,812 97

Disbursements.

Maintenance, instruction and superintendence, . .	\$42,205 91	
Repairs, real estate and other investments, . .	11,163 74	
All other expenses,	9,432 30	
Cash in the hands of the treasurer,	2,011 02	
	<hr/>	\$64,812 97

The total number of blind persons connected with the institution in all its departments on the 4th of November, was 178. Of these, 157 are in the school proper, and 21 in the workshop for adults.

The first class includes 144 boys and girls enrolled as pupils, 10 teachers and employés, and 3 domestics.

The second class comprises 16 men and 5 women employed in the industrial department for adults.

Number of Massachusetts beneficiaries Nov. 4, 1885,	74
“ of adults belonging to Massachusetts,	29
“ of blind persons belonging to other States,	75
Total,	<hr/> 178

The corps of instructors consists of a director, eight literary teachers, ten music teachers with three music readers, one tuning master with one assistant, and two instructors in handicraft with four assistants.

The trustees make the following statements concerning the work of the school:—

“The school—the main object of the institution—has shown better work and finer fruits than ever before,—and this is saying much. In its whole *morale* and spirit, in its methods and achievements, it has continued in the line of steady and consistent progress. It would seem that, by long and earnest seeking and experiment, the secret of true method has at last been found here, and needs only to

be applied as faithfully as it has been of late years to ensure the true reward. It consists in careful adaptation of the schooling to the individual bent, capacity, wants, temperament, etc., of each single pupil; in broad field and variety of topics; in studies, conversations, exercises that enlarge the mind, engage the heart, build up the character, and inspire unselfish motives, with the love of knowledge, while they bring the blind practically more and more upon a level with the seeing."

The following extracts, taken from the 54th annual report of the director to the trustees, give an idea of the work of the school, its progress, and its system of instruction and training:—

"The year just closed has been very prosperous and successful in every respect. Good order and earnest endeavor have been its principal characteristics. Thorough work has been accomplished in each of the departments of the institution, and an excellent degree of progress has been attained in all.

"The number of applicants for admission is steadily increasing; but our facilities for the accommodation of new pupils, especially in the girls' department, are very inadequate. In fact, they have reached their utmost limit.

"The branches embraced in the literary department have been carefully taught and faithfully learned. The study and practice of music have continued to form an important part in the curriculum of our school. Training in the handicrafts has been as valuable an adjunct in our course of instruction as ever; and the exercises both in the gymnasium and the playground have been carried on with regularity and with beneficent effects to the health and strength of the participants.

"Thanks to the ingenuity and patient endeavor of some of our teachers, a new element of vital importance has been introduced, and thus a decided step forward has been taken. Several classes of the younger children have been led not only to handle tangible objects of various kinds, as our pupils have always been taught to do, examining them carefully and ascertaining their qualities and characteristics,—but to make them. The impetus in this direction was chiefly given by the adoption of the kindergarten system, and the fruits of this system in its adaptation to the development of other studies, are clearly manifest in the geographical, botanical, zoölogical, and anatomical models, which are prepared by those of our scholars who have been trained under the influence of Froebel's methods. These models show conclusively, that plastic clay and other pliable materials, used discrimi-

natingly as a means of illustration, and most especially as an incentive to creative thought, will prove more valuable and potent in the instruction of the blind than a great portion of the rubbish which is treasured in many a text-book.

“ Music has continued to be taught here, both in theory as a science and in practice as an art, in a thorough manner, worthy of its real dignity and true value, and has been studied not merely as an accomplishment, or with a view to its usefulness as a profitable profession solely, but as a means of intellectual culture, æsthetic refinement and moral development.

“ The art of tuning pianofortes is one of the most lucrative employments pursued by our graduates at the present time, and the department devoted to its study has continued to receive all the attention which its practical value and useful purposes merit.

“ The contract for tuning and keeping in good repair the pianofortes used in the public schools of Boston has again been renewed for another year on the same terms as the last. This is the ninth time that the work of our tuners has received so emphatic an approval and high recommendation from the committee on supplies of the school board, and we are most grateful to its members for it.

“ The importance of manual labor as the best means for the moral perfection and prosperity of the individual has been duly recognized in this institution from the date of its foundation, and instruction in handicraft has been combined organically with the whole scheme of education, and has been made to support and coalesce with all the other studies and occupations pursued in the school.

“ The importance of physical culture has been fully recognized in our school, and the roots of our system of education are planted in the gymnasium, where a series of well chosen and beneficial exercises, consisting of calisthenics, military drill, swinging, vaulting, marching, climbing, and the like, has been regularly pursued under the direction of experienced and competent teachers. With but few exceptions, designated by our medical inspector for good and sufficient cause, the pupils of both sexes have devoted four hours per week to physical culture by means of gymnastics. The results of this training, blended with the effects of the exercise which they are required to take at intervals on the piazzas, the gallery, and in their daily walks, are very conspicuous in the development of bodily strength and elasticity, the power of endurance, the grace of carriage, the symmetry in growth, the vivacity in movement, and the suavity in manners of the majority of the participants.”

INCOME OF THE MASSACHUSETTS SCHOOL FUND.

Cash on hand January 1, 1885,	.	.	.	.	.	.	\$73,808 84
Net income for 1885,	.	.	.	.	.	.	134,136 87
							<hr/>
							\$207,945 71
Paid cities and towns in 1885,	.	.	.	.	.	\$67,972 77	
Paid educational expenses in 1885,	.	.	.	.	.	67,061 47	
Paid accrued interest on securities bought,	.	.	.	.	.	13 94	
							<hr/>
							135,048 18
							<hr/>
Cash on hand December 31, 1885,	.	.	.	.	.	.	\$72,897 53
From which there is to be paid to cities and towns.							
one-half of income for 1885,	.	.	.	.	.	\$67,061 46	
And return to the fund,	.	.	.	.	.	5,836 07	
							<hr/>
							\$72,897 53
The Massachusetts School Fund amounted January 1, 1885,							
to	.	.	.	.	.	.	\$2,710,241 30
Amount of fund December 31, 1885,	.	.	.	.	.	.	2,710,241 30

In the management of the public schools, the towns derive their instructions and their authority mainly from the State. The school authorities, therefore, find it necessary to make themselves familiar with the Public Statutes relating to schools. Ignorance of the law sometimes becomes the occasion of unauthorized acts both on the part of the towns, and of their agents appointed to organize and conduct the schools.

In this way the schools may suffer from unlawful interference or from neglect. As a fact, however, the towns of the Commonwealth take so much interest in popular education, that they not only obey the laws relating to the public schools, but they almost universally do much more than the laws require. Many of the rights and powers of school officers and teachers are not directly defined in the provisions of the Statutes, but are determined by judicial decisions. Some help may therefore be afforded to those who have charge of the schools by simple explanations in some cases, and in others by reference to the decisions of the courts.

SCHOOL AGE.

Section 1 of chap. 44 of the Public Statutes requires every town to maintain a sufficient number of schools for the instruction of all the children who may legally attend school therein.

There is no legal school age established by the Statutes. The age between five and fifteen has no significance except as a partial basis for the distribution of the income of the school fund. Children between the ages of eight and fourteen years are proper subjects of the compulsory laws. But there is no law of the State forbidding a child entering school before he is eight years of age, or from continuing in it after he is fourteen.

The period from seven to fifteen includes the time in which children wandering about the streets and growing up in ignorance and not subject to any proper parental control, may be classed with truants; but neither the law regulating the distribution of the public money nor the general compulsory law, nor the law relating to truants, establishes a school age which limits the right of the children in their attendance upon the public schools. Section 21 of chap. 44 of the Public Statutes provides that the school committee shall have general charge and superintendence of all the public schools. The supreme court has decided that the power of general superintendence, includes the power to organize the schools, to determine their number in a town, the qualifications of those who are to be admitted to them, the age at which they may enter, and to which they may continue. The power of general superintendence has been declared to include also the power to classify the pupils, and to distribute them in the schools as the committee may think best adapted to their welfare and progress. [5 Cush. 207.

As the compulsory law requires the attendance of all children between the ages of eight and fourteen, and of truants between seven and fifteen, the school committees have no right to make rules interfering with these requirements. With these exceptions they may regulate the attendance of the children in so far as age is concerned.

SUFFICIENT NUMBER OF SCHOOLS.

The number of schools a town should maintain depends on three conditions:—

- 1st. On its geographical extent and structure.
- 2d. On the number of its school children.
- 3d. On their distribution over the town.

The distance which children may be required to walk to and

from the school-house, depends on their age and strength, on the character of the roads over which they are compelled to pass, and on the state of the weather. Taking the school children as they are, and the conditions of travel as they are in our Massachusetts towns, it does not seem wise to require young children to walk farther than one mile, nor any children to *walk* farther than two miles to reach the school to which they have been assigned. For all longer distances convenient transportation should be provided, if necessary at public expense. If this is not done some children in attending school will suffer from fatigue and exposure, and their attendance will be incomplete and irregular. If we turn our attention to the number of children that should be committed to the care and instruction of one teacher, and by this standard determine how many schools shall be kept, we shall find that experience favors limiting the primary schools to thirty or thirty-five pupils, and the higher grades to forty or fifty. Primary pupils derive most of their knowledge and training from direct teaching, and not much from independent study. Older pupils can control themselves. They require simply to be directed in their work. The one requires individual attention, the other may be taught in classes. For these reasons our primary schools should never be so large as to render individual instruction, regular, and in sufficient amount impossible. In thickly settled communities the school authorities have it in their power to organize the schools with reference to proper numbers. The tendency in such cases is to collect too many under one teacher. In smaller communities the school boards should exercise their best judgments in obeying the law requiring a sufficient number of schools, so that there may not be too many nor too few schools for economy or for progress in learning.

ATTENDANCE.

It is the imperative duty of the school committees to bring all the children, over which they have a legal control, into school, at least during the time required by law, and for as much longer time as the possibilities of attendance will permit. The reasons for this are clear in the minds of every intelligent citizen. The private individual must be educated that he may take his place in life. The member of society must be made

intelligent, that he may be able to control himself and prevent himself from becoming a public burden, and an enemy to good order. There is no place for ignorance in a free State. The day laborer must be able to direct his muscular movements with skill, or he will be compelled to give up his place to one who can add to his physical power the element of intelligence.

Business men are now offering the highest rewards to those who know how to direct the forces of nature to the most productive results. The people are demanding a form of education derived from a knowledge of the nature and wants of man, and that every child shall receive the advantages of such an education. The school boards of the towns should keep on their record books the name of every member of their whole school population. This record should be compared with the enrolments on the school registers, and the two lists of names should agree. Teachers, school officers, parents, and the whole body of citizens should unite their efforts to secure an attendance upon the school whose records shall agree with the enrolment, and the number of children which should be in school. [Sect. 16, chap. 44, Public Statutes.]

I desire to call special attention to the great importance of securing a regular attendance of all the children upon the public schools. Let every town in this Commonwealth offer to every one of its children the means of acquiring a good education, and then let the people unite with the school authorities in directing every child of school age to the most earnest use of the means, remembering that ignorance is barbarism itself. Every good citizen should be alarmed whenever he finds a youth in his community growing up in ignorance. No child should be absent from his class in school except for good reasons. Good reasons are limited to those providential interferences over which parents and guardians have no control. If the child is in need of better clothes, and his parents are unable to furnish them, let them be supplied at the public expense. If the parents are in want, let the want be relieved at the public expense, if necessary, and not by child labor, performed at the expense of his public school instruction. No thoughtful parent will plan his affairs in the house, in the shop, or on the farm, so as to require his child to break up into fragments the short term of his school life. If the parent is not thoughtful, the school

authorities and the community in which he lives should be thoughtful for him. It should be settled as a basis of all action, that the children must be in school. If parents are too poor to send their children to school, they must receive aid from the community or the town. If they refuse or neglect to send them, they must be compelled by the application of the benevolent provisions of the statutes of the Commonwealth. The child must not be deprived of the objects of his natural rights. The parent is the natural guardian of these rights, but if he does not recognize the obligations arising from his parental relations, the State must interfere and offer its protection as a substitute.

This leads me to call attention to the compulsory laws relating to attendance.

Sect. 1, chap. 47, provides that every child between the ages of eight and fourteen years shall attend some public day school in the city or town in which he resides, at least twenty weeks in the year. For every neglect of such duty the person offending shall forfeit to the use of the public schools of such city or town a sum not exceeding twenty dollars. The truant officers and the school committees of the several cities and towns shall vigilantly inquire into all cases of neglect of the duty prescribed in this section and ascertain the reasons, if any, therefor; and such truant officers, or any one of them, shall, when so directed by the school committee, prosecute, in the name of the city or town, any person liable to the penalty provided for in the section already referred to.

This is our general compulsory law. It had its origin in the ancient law of 1642, passed on the 14th day of June of that year, and which ordered that the chosen men for managing the prudentials of every town shall have a vigilant eye over their neighbors, to see that none of them shall suffer so much barbarism as to neglect the education of their children and apprentices. This law was enforced by a threatened penalty of twenty shillings for such neglect.

EMPLOYMENT OF CHILDREN.

The laws relating to the employment of children in manufacturing and mercantile establishments should be understood by every citizen of the Commonwealth.

Sect. 1, chap. 48, provides that no child under ten years of age shall be employed at all in any manufacturing, mechanical or mercantile establishment in this Commonwealth.

No child under twelve shall be so employed during the days in which the public schools are in session in the city or town in which he resides. Any parent or guardian who violates this provision of the law shall forfeit for each offence not less than twenty nor more than fifty dollars.

No child under fourteen years of age shall be so employed except during the vacations of the public schools, unless during the year next preceding such employment he has attended for twenty weeks some public school, or some private school approved by the school committee. Nor shall such employment continue, unless such child in each and every year has attended school as provided; and no child shall be so employed who does not present a certificate made by or under the direction of said school committee, of his compliance with the requirements of the law.

Every owner, superintendent or overseer of any manufacturing, mechanical or mercantile establishment, is required to keep on file a certificate of the age and place of birth of every child under sixteen years of age employed therein. If the child is under fourteen years of age, the certificate must state the amount of his school attendance during the year next preceding such employment. The certificate must be signed by a member of the school committee, or some one authorized by him.

The employment of children contrary to these laws may be punished by a forfeit on the part of both the overseer and parent of not less than twenty nor more than fifty dollars, for the use of the public schools.

Every child under fourteen years of age, who cannot read and write, must attend school not only twenty weeks of the year, but the entire time during which the schools are in session.

TRUANTS.

In closing what I have to say concerning the attendance of the children upon the schools, I desire to direct attention again to a class of persons found in every town in greater or less numbers, and for whom our common public schools make

no adequate provision. I refer to children between the ages of seven and fifteen years, who may be found wandering about in the streets or public places, having no lawful occupation or business, and are called truants.

Sect. 10, chap. 48 of the Public Statutes, requires every town to make all needful provisions and arrangements concerning habitual truants and children between the ages of seven and fifteen years, who are out of school, idle and not subject to parental control.

Suitable places are to be provided for the confinement, discipline and instruction of truant children. A suitable place is a good home, where the children may live as members of a well-regulated family; a convenient schoolroom, where they may be taught in a thorough manner the branches of learning enumerated in the statutes; a shop and a few acres of land, where they may be trained in some of the industrial occupations of life; so that when they graduate from the school, they will become intelligent, self-supporting citizens in the communities where they may chance to make their future homes.

To prevent the establishment and support of such an institution from becoming burdensome to the individual towns, sect. 14, chap. 48 of the Public Statutes, provides for the establishment of county truant schools. If three or more towns in any county so petition, the county commissioners shall establish truant schools at the expense of the county, at convenient places therein. If county truant schools should be established and maintained by the counties of the State, the towns of the county could send their truant children to these schools at a small expense, and the truant laws could be easily obeyed.

No town has a legal right to its share of the income of the school fund unless it complies with the laws relating to truancy. It is therefore policy for the towns to petition the commissioners to provide suitable truant schools. Hampden County has provided such a school, and it is accomplishing good results. It has diminished the amount of truancy in the county, and has furnished to its pupils as good quality of instruction as that given in the public schools. It does not appear from the returns that the towns have all complied with the spirit of the truant laws.

TRUANT OFFICERS.

Sect. 11 of chap. 48 provides for the appointment by the school committees of two or more truant officers, who, acting as agents of the committee are authorized to execute the compulsory laws relating to attendance. Their conduct is regulated by a code of by-laws which must be adopted by the towns and approved by the courts. It is the duty of the truant officers to visit the establishments employing children, once in every school term, and as often as the school committee may direct, and inquire into the situation of the children employed therein, and ascertain whether the provisions of the law are duly observed, and report all violations to the school committees.

SCHOOL TEACHERS.

Since the abolition of the school district system, the school committees are required to select and contract with the teachers of the public schools. As the schools are what the teachers make them to be, the importance of the act of selecting them cannot be overestimated.

Before public school teachers can be legally employed and placed over the schools, they must furnish full and satisfactory evidence of possessing a good moral character; of being qualified to teach the branches of learning enumerated in the statutes, and of having the capacity to exercise a wise control over their pupils. The evidence of these things is to be furnished in the results of a personal examination of the teachers, conducted by the school committee.

“Every teacher of a public school shall, before he opens such school, obtain from the school committee a certificate in duplicate of his qualifications to teach. One of these certificates he is to keep for his own use, the other he is to deposit with the selectmen of the town before any payment can be legally made to such teacher on account of his services.”—[Sect. 29, chap. 44, Public Statutes.

It has been decided that a town treasurer is personally liable to the town for the sum he pays to a teacher who has not received from the school committee certificates as the law directs. It is doubtful whether a teacher without a certificate

from the town committee has authority in the schoolroom, either to teach or to control.

Authority of the Teacher.

In Massachusetts, school committees have the general charge and superintendence of all the public schools. — [Sect. 21, chap. 44, Public Statutes.

School teachers, therefore, derive their authority from the committees, and must act under their general direction. With this limitation teachers have authority to enforce obedience to all reasonable rules which the committees have established, and to all reasonable rules of their own, which the committees have authorized them to make. What is a reasonable rule must be determined by legal authority.

The supreme court of Iowa has made the following definition :—

“ Any rule of the school, not subversive of the rights of the children or parents, or in conflict with humanity and the precepts of divine law, and which tends to advance the object of the law in establishing public schools, must be reasonable and proper.”

Attendance.

In accordance with this definition it has been decided that rules may be made and enforced requiring a punctual and constant attendance upon the schools. Tardiness and absence seriously affect the habits and progress, not only of the individual pupils who are irregular in their attendance, but they injure the whole school. The repetition of an act has a tendency to create a disposition to continue to perform it. If pupils at school are allowed to form the habit of being tardy in the performance of their school duties, they will surely experience the disastrous effects of it in all the relations of their active lives. It is generally true that the lessons of the term hold an important relation to one another, so that if one is lost the connection of the whole is broken. A punctual attendance is necessary, therefore, that a pupil may pursue his studies with interest and profit to himself, and without a disturbance of the progress of his classes. For these reasons it is clearly proper that plain and imperative rules should be made forbid-

ding irregularity of attendance, except for causes which neither pupils nor their guardians can control.—[Sect. 16, chap. 44, Public Statutes.

Studies.

The branches of learning required to be taught and studied in all the grades of schools below the high school, are enumerated in sect. 1, chap. 44, Public Statutes. The branches here named must be taught, but the order in which they shall be introduced may be determined by the committee. — [Sect. 33, chap. 44, Public Statutes.

A variety of exercises with other names may be introduced with the approval of the committee. If these exercises are so closely related to the studies enumerated as to be included in them, both alike may be required. Language lessons and written composition may be included in reading and grammar. Lessons on natural objects may be included in language lessons, elementary geography, arithmetic and physiology.

The privileges of secondary instruction are offered to all children living in towns where high schools are maintained, but they are not compelled to accept the offer.

Provision must be made in these schools for teaching the topics named in sects. 2 and 3, chap. 44, Public Statutes. Committees have authority to arrange high school courses of study as well as the courses of lower grades. They may determine what shall be the qualifications for admission to the high schools, and they may require pupils to complete a prescribed course of study, made within the limits of the statutes, before receiving a certificate of graduation. It would seem to be reasonable that all pupils who hold diplomas certifying that they have passed satisfactorily over the branches of study required to be pursued in all the lower schools, should be admitted to the high schools without further limitations.

The studies enumerated in sect. 1, chap. 44, are compulsory upon all children of school age, and must be taken in the order prescribed by the school committee. — [5 Cush., 207.

Limit of Authority in Time and Place.

There can be no doubt that the teacher has authority over his pupils during school hours and on the school grounds. If the acts done out of schoolhouses reach in their influence within the

schoolroom during school hours, and are detrimental to good order and the best interests of the pupils, it is evident that such acts may be forbidden. "There can be no reasonable doubt that the supervision and control of the master over the scholar extend from the time he leaves home to go to school till he returns home from school." The teacher should take care that his pupils on their way to and from the school do not quarrel, or fall into bad company, or disturb the property of others, or behave in any way in an improper manner. The statutes require that the pupils shall be taught to behave well in all places and at all times.—[32 Vt., 114; Public Statutes, sect. 1, chap. 44.]

TEXT-BOOKS AND SUPPLIES.

Sect. 33, chap. 44, requires the school committees to direct what books shall be used in the public schools, and chap. 103, Acts of 1884, provides that books and all school supplies shall be purchased by the committee, at the expense of the towns.

The advantages of the free text-book system are :

1. Economy in time and money. Under the present system, the schools may be supplied, on the first day of the term, with all the necessary means of study. This prevents the long delays that were formerly experienced in organizing the classes, and enables the teacher to make a better classification of his school. Experience has proved that the expense of books and supplies, by the new method of purchase, is reduced nearly one-half.

2. The new system furnishes a good occasion for training the children to take good care of those things not their own, but which they are allowed to use.

3. It has, without doubt, increased the attendance upon the schools more than ten per cent.

4. The public schools of the State are now literally free schools, offering to all, on the same free terms, the advantages of a good education.

The labor of purchasing and distributing the books and arranging plans for a proper care of them will be much less, after the system has been once introduced. Before the Act of 1884 was passed, sixteen towns in the Commonwealth had voluntarily adopted the free text-book system. In all cases of fair trial, the most satisfactory results have been produced.

The few objections that have been made to the free system are :

1. It prevents the children from owning the books they use, and from preserving them for the future.
2. It cultivates a spirit of dependence.
3. Contagious diseases may be communicated by second-hand books.
4. Why not furnish board and clothes as well as books?
5. It requires the expenditure of a large amount of time in purchasing and distributing the books and supplies among the schools.

These are the objections usually made.

The use of the free text-book system does not prevent a pupil from becoming the owner of the books he studies, nor if that were possible, of preserving them. This may be done even at less expense than under the old system.

Experience, however, has proved that school-books are generally worn out by the use to which they are subjected in the schoolroom, and that future reference is more profitably made to new books, representing the latest phase of human thought on the subjects of which they treat. Old school-books are interesting relics. They are even useful as occasions for reviving old associations; but they are not always safe guides in the acquisition of new knowledge. School-books should be bought for present use, as they will be quite surely out of date when the future arrives.

If the statement that the free text-book system takes away the manly feeling of independence, which should be strong in every mind, has any force, it presents an argument against the whole system of free schools. Why is not the manly spirit corrupted by furnishing free teachers, and free schoolhouses, and free apparatus to be used as the means of teaching? On what principle may we furnish everything else free with good results, but cannot furnish free books without harm? As a fact, neither are the schools nor the means of study free to the people in any absolute sense.

The expense of supporting them is borne by those for whose benefit they were established. This is done by a general tax levied in such a manner that the burden of support is made to rest equally on all. With this understanding the people accept

their free school privileges not as a charity, but as a gift presented by themselves.

Free text-books have been used for many years in some of the towns in our own State, and in some of the cities and towns of almost every other State in the Union. No complaint has hitherto been made that these books are the media through which disease is actually communicated.

The sanitary objections to the use of second-hand school-books may be more reasonably urged against the use of books drawn from our circulating libraries, and handled by persons exposed to all the conditions of social life, or against paper money, that by its associations may become the media of many kinds of exchange.

It should not be forgotten that the legislature has passed stringent laws regulating the attendance of children who are suffering with contagious diseases, or who have been exposed to them; and that the free text-books are all committed to the care of the teachers of the schools.

[Chap. 198, Acts of 1885.]

“The school committees shall not allow any pupil to attend the public schools while any member of the household to which such pupil belongs is sick of small-pox, diphtheria, or scarlet fever, or during a period of two weeks after the death, recovery or removal of such sick person. Any pupil coming from such household shall be required to present, to the teacher of the school the pupil desires to attend, a certificate, from the attending physician or board of health, of facts necessary to entitle him to admission in accordance with the above regulations.”

The Iowa State Board of Health sent out the following circular letter to about four hundred physicians residing in Iowa and other States :—

“The State Board of Health is desirous of obtaining sufficient material for the issuance of a report on the communication of contagious diseases by means of second-hand school-books. Will you have the kindness to send in the enclosed envelope all the facts bearing on this subject, occurring in your own practice or that of others known to you.”

In response about two hundred and fifty opinions were received from physicians in different parts of the United States,

who, however much they may disagree upon other subjects, were unanimous in this, that there is no doubt that diseases may be communicated by this means, but they know of none nor have they heard of one.

“The only approach to anything of value comes from a physician in Michigan, who relates a case of scarlet fever communicated by means of a novel which was read by a young lady convalescent from scarlatina, and which was afterward loaned to another. From the best information I can obtain, I am strongly inclined to the opinion that of all methods by which disease is communicated, that by second-hand school-books is the least to be expected. Upon the approach of physical disorder the books of study, which are usually tasks, and at best require considerable mental effort, are the first to be thrown aside, and the last to be resumed in convalescence.

“If any reading at all is resorted to, it is generally such as will amuse. — light literature, everywhere to be found, — and not books the use of which means labor.”—[H. H. Clark, Member of Iowa State Board of Health.

The objection suggested in the question, “Why not furnish clothes as well as books?” has little significance when we consider that the State by its compulsory laws creates the legal necessity of purchasing books, while the necessity for clothes would exist if there were no schools to attend. Clothes should be furnished at public expense whenever this is necessary to attendance.

The advantages of the free text-book system are so many and so important, that a considerable expenditure of time and labor may well be made. Experience and a proper division of labor will lessen both, until a thorough application of the system will not be considered a burden.

METHODS OF TEACHING.

Under their general power of superintendence, the school committees have sole power to determine the method of teaching to be practised in the public schools.

The statutes require certain branches of study to be taught, but in every instance the mode of teaching is left with the school boards.

Instruction in Physiology and Hygiene.

[Chap. 332, Acts of 1885.]

“SECT. 1. Physiology and hygiene, which, in both divisions of the subject, shall include special instruction as to the effects of alcoholic drinks, stimulants and narcotics on the human system, shall be taught as a regular branch of study to all pupils, in all schools, supported wholly or in part by public money, except special schools maintained solely for instruction in particular branches, such as drawing, mechanics, art, and like studies. All acts or parts of acts relating to the qualifications of teachers in the public schools shall apply to the branch of study prescribed in this act.”

Physiology is that knowledge which has for its object the structure and functions of the organs of animals and plants. Human Physiology is limited to the organs of the human body.

Hygiene is a knowledge of health and disease of the organs of a body.

Alcohol is the intoxicating principle of fermented liquors.

Stimulants are substances which produce an unnatural increase of vital activity.

Narcotics are substances which have a tendency to paralyze the nerves and produce stupor and sleep.

By the term “regular branch,” is meant one that is included in the list of those required by law to be taught. Formerly physiology and hygiene were optional studies. By the Act of 1885 they were introduced among the required branches.

“All pupils in all schools,” are all pupils in the primary, intermediate, grammar and high schools of our system. The law requires physiology and hygiene to be taught to all pupils in all schools with special reference to the effects of the above named substances on the human system. The only intelligent, successful teaching must be by the oral objective method.

ORDER OF GENERAL TOPICS RELATING TO ALCOHOL, ETC.

- | | | | | | | | | |
|----------------|---|----|---|-------------|---|----|---|------------|
| a. Origin, | } | of | { | 1. Alcohol, | } | as | { | Stimulants |
| b. Properties, | | | | 2. Tobacco, | | | | and |
| c. Uses, | | | | Opium, | | | | |
| d. Effects. | | | | 3. Tea, | | | | Narcotics. |
| | | | | Coffee, | | | | |
- e. Duties arising from the knowledge derived.

CORPORAL PUNISHMENT.

“The school codes of the United States are generally silent in regard to the right of teachers to inflict corporal punishment; but there are numerous judicial decisions in favor of this right.”

By English and American law, a parent may correct his child in a reasonable manner, and the teacher is *in loco parentis*. — [1 Blackstone, 453; 2 Kent, 205; 27 Maine, 280; 32 Vermont, 114, 123; 4 Gray, 37.

1. To justify the infliction of corporal punishment there must be sufficient cause.

2. It must be administered in a proper manner and to a moderate degree.

3. It must be done without malice on the part of the teacher, and with the sole object of preserving good order in the school.

It has been considered in the past, by good authority, that a sufficient cause for applying this form of punishment may be found in an obstinate and persistent refusal by the pupil to obey the reasonable rules of the school.

That when all other influences fail to move the will to choose a proper conformity to the requirements of good order in school — then, according to the judgment of some, corporal punishment may be introduced as a last resort.

If corporal punishment is used, it must be with the most careful reference to a strict propriety. In no case, should it ever be applied to any part of the head or to any other part of the body easily injured. No instrument should be kept on hand, specially designed to be used as the means of punishment. It should be in no way adapted to suggest ideas of cruelty or to arouse the passions. In its selection, great care should be taken that no exhibition be made of bad taste or poor judgment, or want of a refined spirit. Severity in punishment should be avoided. It should not be forgotten, that the good moral effect of physical punishment is not due to the amount of it, so much as to the good sense and regard for justice exhibited in its application. The law will protect the child from all excesses of punishment.

The Prussian law provides that no punishment shall be

administered beyond the bounds of moderate parental discipline.

“ A teacher, in the exercise of the power of corporal punishment, must not make such power a pretext for cruelty and oppression ; but the cause must be sufficient, the instrument suitable, and the manner and extent of the correction, the part of the person to which it is applied, and the temper in which it is inflicted, should be distinguished with the kindness, prudence and propriety which become the station.” — [4 Gray, 36.

This form of punishment may be so applied as to furnish an expression of anger and malice, or of affection and a strong desire to promote a personal good.

Modern civilization is opposed to more than a very limited use of corporal punishment in the schools. It is rather in favor of appealing to higher principles of action than those found in the animal desires. There is a general admission, however, that it is not wise for the authorities to pass orders forbidding its use, as such action might encourage disorder and relieve the disorderly from any apprehension of suffering the penalty of their misconduct. The good sense and humanity of the teachers of the public schools, guided by a knowledge of public sentiment and the known will of the school committee, may be trusted to prevent the use of improper forms of inflicting punishments or of bestowing rewards. If corporal punishment is ever to be inflicted, it should be limited in its application to the young, who are deriving most of their impressions through the senses.

Among the principles of action that render the young subjects of control, are a desire for an expected good or an aversion for an expected evil. Physical rewards they consider to be a good, and physical punishments an evil. For these reasons they are inclined to choose the one and reject the other. Hopes and fears enter largely into the motives which are the occasions of youthful activity. But after a time the hope of reward would depart if the reward itself should always be withheld ; and the fear of punishment would cease to exist, if punishment was never known to be an object of personal experience. When this takes place the controlling hopes and fears must be reproduced in the mind by the sensible presence of

their objects, or the possibility of government would be lost. In this is to be found the necessity and philosophy of rewards and punishments, if there is any necessity and philosophy connected with them.

If physical punishments are restricted to their proper applications, the amount of them required would be too small to occasion any ideas of severity or impropriety. A teacher who finds it necessary to use corporal punishment to any appreciable extent, gives evidence of a want of ability to control.

A correct method of teaching, a knowledge of the true springs of human action, a good judgment, a conscientious regard for justice and a strong will, on the part of the teacher, will generally produce on the part of the pupil enthusiasm in study and a desire to act from a sense of duty, the highest principle of action.

No form of school government will produce good results if it is administered in a bad spirit, or in an improper manner, or to an unreasonable extent. It is expected that the teachers of our Commonwealth will be able to regulate the conduct of their pupils at all times, by the use of the nobler principles of action found in a love of that which is for their good on the whole, or in a sense of duty.

EXPULSION.

“The right to attend school is not absolute, but is conditional upon compliance with the reasonable rules and regulations of the school.”—[48 Vt., 473.

“The school committee has authority, not subject to revision if exercised in good faith, to exclude a pupil from a public school for misconduct which injures its discipline and management.”—[105 Mass., 475.

The teacher can suspend, but it is reserved for the committee to expel. Expulsion is frequently made a substitute for corporal punishment, and is sometimes the only alternative.

The objections to excluding unruly children from the advantages of school discipline are: 1st. These persons especially need the reforming influences of a good education. 2d. To exclude such children from school and thus deprive them of all proper training, would introduce into society an element which will be likely to prove a burden to its treasury and a source of

corruption to its morals. It is a last resort, and should be employed only when the pupil is beyond control by all ordinary means, or when his bad example endangers the good morals of his companions.

The necessity of expelling from the public schools those that cannot be controlled in them, proves the necessity of adding to our school system institutions especially adapted to reform the morals as well as to communicate knowledge. The well-being of every community requires it to provide with great care for all those young persons not subject to the ordinary means of control. Whenever a pupil who has been expelled from school gives evidence of reformation, or of a willingness to submit to the proper authorities, he should be readmitted, and encouraged to the most earnest effort in trying to retrieve what has been lost.

REGISTERS.

Sect. 3, chap. 41 of Public Statutes provides that "the Board of Education shall prescribe the form of registers to be kept in the schools, and the form of the blanks and inquiries for the returns to be made by school committees." Sect. 6, chap. 46, requires the school committee to cause the school registers to be faithfully kept in all the public schools.

The registers furnish the data from which the blank forms of inquiry are to be filled up. These blank forms are to be returned to the Secretary of the Board of Education, to be used by him in making up the statistical tables of his annual report.

It is most important that these statistics be as accurate as possible, for upon them is based our school legislation, and our knowledge of the state and progress of our public school affairs.

No apportionment or distribution of the income of the school fund shall be made to any city or town which has not made the returns required by sections six and eight of chapter forty-six, or does not make them accurately and within the time specified in section eleven of the same chapter; and the town or city shall in addition thereto forfeit not less than one hundred nor more than two hundred dollars.

PENALTY FOR DISTURBING SCHOOLS.

The Public Statutes have made most ample provision for protection of public schools, school-books, and schoolhouses.

Whoever wilfully interrupts or disturbs a school, or other assembly of people met for a lawful purpose, shall be punished by imprisonment in the jail not exceeding thirty days, or by fine not exceeding fifty dollars.—[Public Statutes, sect. 23, chap. 207.

PENALTY FOR DEFACING SCHOOLHOUSES.

Whoever wilfully and maliciously or wantonly and without cause destroys, defaces, mars or injures a schoolhouse, church or other building erected or used for purposes of education or religious instruction, or for the general diffusion of knowledge, or an outbuilding, fence, well or appurtenance of such schoolhouse, church or other building, or furniture, apparatus or other property belonging to or connected with such schoolhouse, church or other building, shall be punished by fine not exceeding five hundred dollars, or by imprisonment in the jail not exceeding one year.—[Public Statutes, sect. 78, chap. 203.

SUPERINTENDENTS.

The superintendents of the public schools of the Commonwealth are agents of the school committees, and are subject to their direction and control. As these agents are supposed to be skilled in educational affairs, and are able to give their whole time and talents to the performance of the duties of their office, the committees will do well to allow them to nominate the teachers of the schools, to arrange the course of studies to be taught, to select the text-books to be used, to direct what methods of teaching shall be practised, and what shall be the basis of classification in the various grades of instruction. All these acts of the superintendents will, of course, be subject to the approval of the school committee. It should not be forgotten by both superintendents and committees that school teachers are skilled agents, and on that account should have a large liberty in the management of their schools. For the well-being of the schools, both superintendents of schools and teachers, if doing good service, should be retained permanently in office.

About sixty towns of the Commonwealth are provided with public school superintendents. The schools of the remaining two hundred and eighty-seven towns are under the supervision of school committees. For the reason that the schools of a country are good as their superintendence is intelligent and thorough, and poor as their superintendence is aimless and accidental, it seems desirable, and even necessary, that some provision should be made for extending special and efficient superintendence over every public school in the State.

The cities and large towns have already supplied themselves with special superintendence. A thorough examination of their schools will show the great advantages of a wise direction. These towns have better schoolhouses, better teachers, a larger average attendance of pupils, and a higher order of school exercises. For these reasons the schools are popular with the people, and they are willing to make sacrifices to support them. The schools in many of the other towns are not improving. In some cases the schoolhouses are not fit places for the teachers and the children to live in during the school hours of the day.

The teachers are sometimes selected from the graduates of the ungraded district schools of the town, having no preparation for their work, except a very limited and imperfect knowledge of the common English branches of learning, and a sort of inherited instinct that inclines them to do for their pupils what has been done for them. These teachers have generally strong minds and good hearts, but they have no adequate preparation for an intelligent performance of the high duties devolving upon those who have charge of public instruction. The schools of these towns are generally conducted without a plan. The courses of study are not always arranged with reference to the acquisition of useful knowledge, or the development of the mind. The class exercises consist for the most part of questions and answers relating to that found in the text-books, and often to nothing else. The means of teaching are either wanting or are little used. The children are in some towns very irregular in their attendance, and leave school altogether as soon as the compulsory laws of the State will let them go, and the people, estimating their schools for what they appear to be worth, give to them a hesitating and inadequate support. Sect. 44, chap. 44, Public Statutes, provides for the arrangement of the

small towns in districts, for the purpose of employing a superintendent of public schools therein. If the provisions of this section were accepted, the small towns could secure for themselves a quality of superintendence equal to that provided by the cities. The experiment has been tried, and in all cases it has proved eminently successful.

The burden of supporting the public schools falls heavily on some parts of the Commonwealth. Where there is a scattered population and a small amount of taxable property, the people cannot give to their schools a proper support. They are unable to raise a sufficient amount of funds for the construction of good schoolhouses, or for supplying their schools with good teachers, or for placing over them an efficient superintendence. The State requires public schools to be maintained for public as well as private utility. In all cases where the distribution of wealth and population renders the support of good public schools a heavy burden, if not an impossibility, the State should give all needed assistance.

The present high civilization of the Commonwealth cannot be maintained unless the advantages of a good education are made universal. It seems now to be necessary for the State to make an appropriation of money to be distributed among the smaller towns to aid them in providing for their schools qualified teachers and adequate superintendence.

RELATION OF THE KINDERGARTEN TO THE PRIMARY SCHOOL.

The mind by its activity is the cause of its own development. The nature of the activity will determine the nature of the development. As every mental act leaves its impression on the mind that acts, it is highly important that the infant mind be set off aright in the first exertion of its active power. It seems necessary that even the plays of children should be so directed that the formation of good habits will be promoted, and of bad habits prevented. This suggests the establishment of institutions that have for their object a training more elementary than that given in our primary schools.

In determining the relations which the kindergarten should hold to the public primary school, it is necessary at first to make plain what states of mind the child must possess that he may enter with facility upon his primary course of instruction.

On entering school the primary pupil is directed at once to his language lessons. The ability to use language implies a knowledge of that which it expresses, and of the signs by which expression is made. Language may be used to affirm names and qualities and relations of objects of thought.

The first work, then, of the children in the primary schools is with objects and their names. Facility and accuracy, in the performance of such mental exercises, are acquired by practice. The kindergarten, with its occupations and gifts, brings its members in constant contact with the objects of their ideas and with the signs by which they are known. In this way facility in observing and in using language will be produced before the children come to their special tasks in the primary school. In connection with the facility, a fondness for handling objects will be cultivated, which is a most important condition of true progress.

Secondly, occasions may be presented for distinct ideas by leading the child to set the qualities of objects apart from one another, by analysis, for more special examination. A preparation for this work is made by exercises with the qualities of bodies. The kindergarten, with its objective methods, brings form, color, size, number, etc., into the presence of the children and encourages them to become familiar with their appearances, and skilful in arranging them in new combinations. The observation of individual objects of thought as wholes, and the analysis of them for a knowledge of their properties, are the elementary steps that must precede the consciousness of comprehensive ideas. At the first the child has no facility in the use of his faculties, nor has he any tendency to use them in an orderly way. By use, both facility and habits will be acquired and the nature of the facility and the character of the habits will be determined by the kind of use which produced them. For these reasons it plainly appears that the first activity which the child exerts, although spontaneous in its origin, must be rightly directed, in so far at least as may be done by turning his attention to proper objects, and such as constitute the elements of all scientific classification. The playful occupations of the young children in the kindergarten have a tendency to produce a symmetrical development and to occasion

those simple ideas of things, which ideas are to be the elements of all future knowledge.

It is of the highest importance to the child that his faculties do not become dwarfed at the first, by being deprived of proper mental food. The development of every human mind is self-development produced by self-activity, but the activity is modified by the nature and relations of its objects.

If the work done for the young child in the infancy of his life is well done, he may be introduced into the primary school with a love for knowledge, with many clear and distinct ideas, and with that which is of the highest importance to the young primary pupil, some power of self-control.

On entering the primary school the pupil is to be put to the use of his senses. Objects of knowledge are to be brought into his presence, as the occasion of ideas, and his mind is to be trained to form from them true judgments of the objects themselves. There is a culture, then, which should precede and prepare the children for their primary school work. It may be introduced through those influences that simply direct the children in their plays. Locke says that all the plays of children should be directed towards good habits, or else they will introduce bad ones.

I believe experience has proved that the development occasioned by a course of kindergarten exercises prepares the children to enter with facility upon that course of elementary instruction which it is within the province of primary schools to conduct. It would be well if the spirit of the kindergarten were introduced into all primary education. Here, too, the teacher should study the nature of the child, acquaint himself thoroughly with the great ends school life should be adapted to produce, and teach with constant reference to the true principles of teaching.

It would be well if the kindergarten could be made a universal institution. Every child, either at home or in an organized class, should from his early years be directed in his spontaneous activity. The direction should have reference to a harmonious development. If the child can be started off from the first in the race of life, in a way that will co-operate with nature in producing natural results upon himself, no after

labor need be spent in preparing him to begin his public school work.

There are many obstacles in the way :

1st. Many communities are already overburdened with school expenses, and they think they cannot contend with more.

2d. The system of public schools already established takes up the child at five or six years of age and carries him on through all the grades of elementary and scientific study, till he graduates from the high school, and there seems to be no place for the kindergarten in the system.

3d. The successful kindergarten educator must be most thoroughly equipped for the duties of her office. In addition to the best inherited qualities she must have acquired a good knowledge of the philosophy of education, and be furnished with a successful experience.

4th. Many believe that the child should run loose for some years ; that no more restraint should be put upon his conduct than is necessary to preserve his existence and prevent him from disturbing other existences that may chance to fall in his way.

It is to be hoped that a higher civilization will find a way to remove these obstacles, and that the children will begin their intellectual and moral lives under the influences most favorable to a true development.

If the children come up to the primary school through the kindergarten, they will be prepared to take hold of primary school work with great facility and real enthusiasm. Throughout their kindergarten course their active powers have been brought into constant use. The experiences they have acquired by actually handling the objects of their study have given them both the strength and love for investigation. Their social natures, unfolded under the guidance of good models and wise directors, have been trained also to act in harmony with the conditions of a proper social life.

The spirit of the kindergarten should be continued in the primary school. This observation directs our attention to the method of teaching to be employed. There are two methods : one attempts to bring the objects of study before the pupil's mind through the medium of books, or of explanations, or of lectures ; the other brings the objects themselves, and trusts to

no other occasions, as the original source of ideas. The first method is a thorough violation of the spirit of the kindergarten and of all principles of science teaching; the other is in full harmony with both. The truth of these statements may be made to appear. The kindergarten aims to cultivate self-activity. This it does by inviting the children to use their senses in examining the unknown objects within their reach. It everywhere recognizes first-hand experience as the true basis of knowledge, and makes it an end to train the children to a good method of activity rather than to attempt to pour into their minds a large amount of information. In this way the discipline of the kindergarten prepares the faculties for independent work in study and in executing the affairs of practical life. True elementary science teaching always presents the phenomena of nature themselves and never allows a text-book to come between the learner and the facts he should be allowed to observe. It may be well to inquire at this point what may be accomplished by the use of books.

1st. We may find in them expressions of ideas which other minds have before formed.

2d. They may direct us in our studies.

3d. Books may lead our minds to reproduce knowledge that has before been the object of our consciousness.

In the first case, the ideas excited in the mind of the reader will correspond to those of the writer, only so far as the reader has been conscious of similar ideas before, and has become acquainted with the language by which they are expressed. It should be observed that when we read we are led to recall or reproduce some mental states we have had before, and by an act of imagination to modify these states, so as to conform to those which we suppose the author is describing. In this way we try to understand what the writer thinks of the objects of his thoughts, though as a fact we may not after all know what is true of the objects themselves. This truth is illustrated in the old grammars. The authors say that the grammatical subject of a proposition is that of which something is said. The learner commits this definition to memory and fancies he understands its meaning. He is satisfied with his information so long as he confines his study to the book, but if he by chance turns his attention to the proposition he will find that while the

statement or definition may express the truth concerning the writer's ideas of the subject, it may not express a particle of truth concerning the subject itself. This example illustrates the results of all teaching that attempts to present objects of thought of any kind by the use of books only. Unless the learner is sometimes brought in actual contact with the objects of study his knowledge will be a "delusion," and utterly without value in all future scientific classification. All men of scientific habits understand this, and they have no respect for that teaching which confines itself to books. Besides, it should be understood by every intelligent teacher that books do not develop scientific habits or furnish occasions for the scientific training of the faculties. To accomplish these results the child must be put to investigating for himself. It is of little consequence to him what other minds have acquired, only so far as their knowledge and their example may guide him directly to that form of activity which is best adapted to produce in him good habits and right training. The teacher should never forget that his success is to be measured by the kind and amount of labor he can lead his pupils to perform for themselves. A proper question to be put to the graduate, as he leaves school for real life, is not, how much do you know, but what have you become, or what can you do; and he should be able to say that he can control himself, and do anything that the duties of life require him to perform.

As the children advance in their courses of study they may be led to hold the same relations to reference and text-books that they have before sustained to their teachers. After the pupil has gained a considerable amount of elementary knowledge the book may direct him to the objects of his investigation, and direct him in the study of their parts and qualities and relations. In scientific study, the book used may suggest what past knowledge of individual objects the student should reproduce, — objects which he has once examined and now desires to classify; but in all cases in which language may be used it should not be trusted to take the place of the objects of knowledge, nor should the investigation made by one mind relieve another from making a similar investigation, in so far as school work is concerned.

Knowledge once obtained from true sources, and by a right

method, may be recorded in books, and the records, not the knowledge, may be preserved in these books. By that law of association that binds together signs and things signified, the records, which are the signs, will enable the mind that has before been conscious of the knowledge, the thing signified, to reproduce that knowledge. But the records are sealed to those who come to them as the original source of knowledge. The method of teaching practised so generally in the schools, and advocated still by a few who bear the marks of having been brought up on books, creates the habit of mistaking words for things. This method is the true object of a reform. Where the spirit of the kindergarten prevails in the elementary schools the reform will take place. We shall then see what the friends of a rational method of teaching have long labored to bring into existence, the use of the real objects of knowledge in all departments of study, and the free exercise of the active powers of the children in acquiring the knowledge. The employment of such means and methods will furnish the occasion of that strong and symmetrical development of the faculties, which the present methods of teaching and study are not adapted to produce. This reform in our schools has already commenced. It is true that it is not yet anywhere more than partially introduced. Where it exists at all it is for the most part without a definite and comprehensive plan. The educators of the country would do well to determine intelligently what must be done that the schools may accomplish that which the people have a right to expect of them, and then make such changes in school methods as may be required. The reform that would follow might not involve any radical change in topics of study or in school exercises. It would simply require the teachers to put the proper objects of study in an orderly manner into the hands of their pupils, and direct them in a free exercise of their own faculties in all their processes of learning. We should then see our barren schoolrooms adorned with the proper means of teaching, such as natural objects, illustrative apparatus, maps and charts, and books for reading and reference.

The teachers would be found standing before their classes using these means of teaching according to the plan arranged in their well-made-out topics. These objects would be brought

into the presence of the pupils and they would derive their knowledge through a personal experience. Such exercises train the mind to observe and to reflect. They furnish facts and the true materials for scientific study. The act of committing to memory the language of rules and general principles, without individual investigation and analysis, — that style of teaching which addresses itself to the passive powers only, — will be abandoned, when the simple philosophy of the kindergarten pervades our whole system of public instruction.

An intelligent study of teaching, with reference to its great ends, will magnify the importance of introducing a system of development which shall precede all primary school work. We need a system that will direct the child, from the first, in a way that will prevent him from sinking into inactivity or from forming depraved habits; a system which will occasion the activity necessary to produce good character, a thirst for knowledge, and facility in the use of all the faculties.

It is not yet a plain case how the kindergarten may be included in a system of public schools, — some of the arguments in favor of such an arrangement have been given. The thing can be partially accomplished by allowing our primary schools to pursue kindergarten methods for a period of time before entering upon what is now considered to be elementary training. Another way is to combine kindergarten instruction with regular primary school work. In this case the children would enter school at an earlier age than they do under the present organization.

The methods of the kindergarten are not in harmony with the methods practised in the schools as now conducted, so that the children in passing from one to the other would be disturbed at the change and unprepared to accommodate themselves to it.

A successful kindergarten teacher must be fitted by nature and training for the peculiar service she is to render. She must have a strong mind and a good heart as the basis of her accomplishments. She must understand the philosophy of education and be skilled in the application of its principles to the infant mind. There are not many such teachers known to the profession. The number, however, is increasing, and the demand for their services is increasing also. If the State is not

quite ready to incorporate the kindergarten as an element in its system of public schools, the home is a good place for kindergarten instruction to be given. Here, subject to the pure influences of a wise parental love, the young child should be started off in his human life free from unnatural restraints and unhappy associations, stimulated by good examples and a consciousness of the harmony existing between the faculties of his mind and the objects of their activity.

COURSE OF STUDIES FOR THE PUBLIC SCHOOLS.

1. Elementary Course.

The elementary schools of the Commonwealth are the different grades below the high school. The kindergarten does not yet form a part of our system of schools. It is of the highest importance that the elementary and high schools should have such courses of instruction provided for them, as will supply the best occasions for knowledge and development.

The following courses of study are presented to be used by the school committees and superintendents of the State, as guides in preparing courses for their own schools. It will be observed that a course of kindergarten instruction will prepare the young pupil to enter with facility upon primary studies.

PLAN OF INSTRUCTION FOR ELEMENTARY SCHOOLS.

[Prepared by Supt. E. H. Davis.]

GRADE I. (FIRST HALF YEAR)

READING. — Vocabulary of two to three hundred words taught to be read at sight in easy combinations, from script representations.

Appliances. — Objects, crayon, blackboard, pointer.

SPELLING. — Oral, as soon as the children learn to recognize script representations in reading.

(SECOND HALF YEAR.)

READING. — Any approved First Reader, short sentences, first half of five to ten different books.

SPELLING. — Oral and written, chiefly words from the reading lessons.

(FIRST YEAR.)

LANGUAGE. — Oral most prominent. Talks about objects, — pictures; the human body, animals, familiar plants; the senses, size,

place, form, color; and whatever the ingenuity of the teacher may suggest. Encourage original expressions and do not expect to correct every mistake at first; rarely while a child is talking. Little should be undertaken in written language beyond copying easy sentences from the blackboard or slips, or writing them from dictation. Correct errors in the use of language spoken or written, as opportunity affords, in every grade.

ARITHMETIC. — Numbers from one to ten inclusive, and the different combinations of addition, subtraction, multiplication and division, of which each may be composed.

Appliances. — Table and objects used as aids. The problems should deal chiefly with concrete numbers — answers not greater than ten, — the object being to cultivate the power of reasoning.

Incidentally. — General exercises with simple abstract numbers, the operations occasionally expressed on the blackboard and slates.

Simple concrete illustrations of fractions.

Roman numerals.

Pupils encouraged to originate concrete problems for the class, no one being allowed to put a question unless he knows the right answer.

GRADE II. (SECOND YEAR.)

READING. — Second half of the First Readers used in the first grade, and the first half of an equal number of Second Readers.

SPELLING. — Oral and written, words from the reading and language lessons. Written spelling of the more difficult words, in blank books, the books to be kept for reviews. Dictation of words in sentences daily.

LANGUAGE. — Oral and written, both being of equal importance. Use the same general material as in the first grade. Teachers should relate interesting stories and require them to be reproduced by the pupils, orally and in writing. Stories from the reading lessons treated in the same way. A free, intelligent exercise of the imagination in talking about pictures. Use of capitals, question mark, period, and a large amount of dictated exercises. Recitations, memorizing of selections of poetry found in the reading books.

Simplest form of letter-writing.

ARITHMETIC. — Numbers to twenty inclusive and the various combinations which may enter into the development of each.

A great variety and amount of concrete problems.

Practical measurements with the gill, pint, quart, gallon; quart, two-quart, half-peck, peck, half-bushel; inch, foot, yard, rod; ounce and pound, — having the measures in hand.

Incidentally. — The four operations with simple abstract numbers, mentally, and with crayon and pencil. Written arithmetic; using small numbers, and no multiplier or divisor larger than six.

Simple concrete illustrations of fractions.

Roman numerals.

Original concrete problems by pupils.

GRADE III. (THIRD YEAR.)

READING. — Second Readers completed and one easy Third Reader.

SPELLING. — Same as second grade. Words dictated in sentences, daily.

LANGUAGE. — Material of preceding grades enlarged; object to familiarize with whatever is likely to occasion mistakes. Stories from the reading lesson enlarged upon by a free use of the imagination. Hyphen, apostrophe, words alike in sound but of different orthography, paragraphing, recitation, declamation, memorizing selections of poetry from the Readers, letter-writing, dictation.

ARITHMETIC. — Numbers to fifty inclusive.

A great variety and amount of concrete problems.

Practical use of dry, liquid, linear, and avoirdupois measures, — measures in the hand — with practical problems from the same.

Incidentally. — Digits expressed in columns on the blackboard, added orally. Written arithmetic in the four operations, using no multiplier or divisor larger than twelve. Deal with small numbers until accuracy and rapidity are acquired.

Simple concrete illustrations of fractions.

Roman numerals.

Original concrete problems by pupils.

GRADE IV. (FOURTH YEAR.)

READING. — Any approved Third Reader, as many books as possible. General exercises in phonic analysis.

SPELLING. — Same as preceding grade.

Incidentally. — A spelling book may be used, as supplementary to constant practice with difficult words at the time of their occurrence.

LANGUAGE. — Same as preceding grade.

ARITHMETIC. — Concrete mental problems most prominent.

Written arithmetic in the four operations, no multiplier or divisor exceeding two figures.

Addition and subtraction of integers with decimals, — two places.

United States money.

Simple concrete illustrations of fractions.

Incidentally. — Addition of integers expressed in columns on the blackboard, rapid combinations of simple numbers with answers at sight.

Original concrete problems by pupils.

GEOGRAPHY. — 1. A childlike conception of the earth — as a great ball, with a surface of land and water ; surrounded by air ; lighted by the sun, and with two motions.

2. *a.* Observation lessons on natural features.

b. The different forms of land and water, shown by means of moulding board, pictures and blackboard drawings.

c. Preparation for and introduction of maps ; review of primary school lessons on position, distance, direction, points of compass, with representations on a scale ; study of a map of the vicinity drawn on the blackboard ; study of a map of the town ; maps of natural features, drawn from moulded forms.

3. General study from globe and maps.

a. The hemispheres, — continents, grand divisions, oceans, and large islands ; their relative position and size.

b. The grand divisions, position and climate (hot, cold, temperate) ; form, outline, surroundings ; principal mountains, rivers, lakes ; the most important countries, productions, people, cities ; interesting facts and associations.

GRADE V. (FIFTH YEAR.)

READING. — An elementary history of the United States, any suitable geographical reader and suitable classics from familiar authors. Any approved Third Reader, to be used for drill exercises only. Phonic analysis.

Pupils are expected to have acquired, at this stage, sufficient understanding and fluency to read good literature. This they may do with a full assurance of good results.

SPELLING. — The same as fourth grade.

LANGUAGE. — Continuation of the work of the third grade.

Let the teacher read selections from interesting subjects, — several pages at a time, — pupils reproduce. Stories may be read in silence and reproduced by the pupils.

Encourage the relation of anecdotes and stories which the pupils have obtained by their own research, requiring them to be told in good English and with good effect, afterwards reproduced in writing by the class. Oral descriptions of various objects of foreign and domestic commerce, — with the object in hand, — as suggested by the geography lessons (information may be gained by consulting the Encyclopædia) ; how various articles are manufactured ; the general news of the day that may be of historic value ; abstracts from any of the lessons.

Dictation of various exercises, frequently, to show the right use of punctuation, contracted words, etc. ; synonyms ; paragraphing ; letter-writing ; business forms ; telegrams ; declamation ; recitation ;

memorizing of poetry which occurs in the reading lessons, and other selections, once a week ; original composition.

NOTE. — Give definite instructions and assistance in all original composition, such as selecting subject, outline, topics, matter, etc.

ARITHMETIC. — Mental arithmetic, introducing the text-book.

Written arithmetic in the four operations.

Elementary practice in common and decimal fractions, factors, and percentage.

Incidentally. — Digits expressed in columns on the blackboard ; rapid combinations of simple numbers with answers at sight.

Original concrete problems by pupils.

GEOGRAPHY. — Simple studies of the *important countries* of each grand division, position of the country in the grand division ; its natural features, climate, productions ; its people — their occupations, governments, manners and customs ; its noted localities, cities, etc.

Moulding board and map-drawing to be used as aids in the study. Memory-maps are not required.

Our own state and country to be studied first. More or less time to be given to the study of the different sections of our country, and to other countries, according to their relative importance.

GRADE VI. (SIXTH YEAR.)

READING. — An elementary history of the United States (different text-book from the one used in the fifth grade) ; any suitable classics.

An approved Fourth Reader for drill exercises only.

SPELLING. — Same as fourth grade.

LANGUAGE. — Same as fifth grade.

Incidentally. — The formation of the plural ; the principal parts of speech distinguished and words classified in accordance therewith ; subject and predicate.

ARITHMETIC. — Same as fifth grade.

GEOGRAPHY. — North America, special attention given to the United States.

The text-book should be completed in two years, not in detail or in course, but essential facts only.

Some simple scheme in the study of the different countries should be prescribed. The following, among several, might be selected : —

Scheme.

- I. In what zone ; climate ; boundaries ; capes ; bays ; gulfs ; seas ; islands ; peninsulas.
- II. Surface ; mountains ; plains ; rivers ; valleys.
- III. Productions ; animals (wild and domestic) ; vegetables ; minerals.
- IV. Drainage ; rivers and lakes.
- V. Cities.

- VI. Business; agriculture; manufactures; commerce; mining, etc.
- VII. Read with classes the geography of countries as given in their text-book, or in supplementary books.
- VIII. Religion and government.
- IX. Draw memory-maps of the countries once a week.
- X. Learn interesting facts about the countries studied by reading books of travels, adventures, etc.

Interesting facts — numbered X. in the scheme — should be prominently interwoven with each recitation.

Place the scheme — printed on stiff card — in the hands of the pupils, and assign lessons to cover each point before undertaking to follow it in recitation.

GRADE VII. (SEVENTH YEAR.)

READING. — A history of the United States (different text-book from that used in either of the two preceding grades); any suitable classics. Any approved Fourth Reader for drill exercises only.

SPELLING. — Same as fourth grade.

LANGUAGE. — Continuation of the work of fifth grade.

Incidentally. — 1. The simple sentence.

a. The subject and predicate.

2. *a.* The noun and verb, with special reference to their use in sentences as subject and predicate.

b. The personal pronoun as a subject.

3. *a.* The definite and indefinite article.

b. The adjective and adverb as modifiers, — 1st, words; 2d, phrases.

4. Nouns, pronouns, verbs, adjectives, and adverbs, with special reference to changes in form to express grammatical properties.

5. Punctuation of simple sentences.

ARITHMETIC. — Mental arithmetic; reduction; mensuration of surfaces and solids.

Incidentally. — Common and decimal fractions, and percentage. Digits expressed in columns on blackboard, rapid combinations.

Original concrete problems by pupils.

GEOGRAPHY. — South America, Europe, Asia, Africa and Australia, treated according to the general scheme in the sixth grade.

GRADE VIII. (EIGHTH YEAR.)

READING. — Any suitable classics and any approved Fifth Reader for drill exercises only.

SPELLING. — Same as fourth grade.

LANGUAGE. — Continuation of the work of fifth grade.

Incidentally. — Compound and complex sentences. 1. Compound

and complex sentences formed from simple sentences. Example: "I saw the boy." "The boy was skating" (simple). "I saw the boy and he was skating" (compound). "I saw the boy who was skating" (complex).

2. Conjunctions (co-ordinate and correlative).

3. Study of phrases with special reference to the use of the preposition.

4. Study of clauses with special reference to the use of relative pronouns and subordinate conjunctions (include conjunctive adverbs).

5. Substantive phrases and clauses.

6. Interrogative and adjective pronouns.

7. Study of the verb.

a. Regular, irregular, transitive and intransitive.

b. Principal parts.

c. Auxiliaries (moods and tenses).

NOTE. — Conjugations not required.

8. Participles and infinitives, their uses in sentences.

9. Analysis, — to include subject, phrases and clauses.

10. Classification of parts of speech, as independent, limiting, and connecting.

ARITHMETIC. — Mental arithmetic; longitude and time; percentage and its application to profit and loss, commission, insurance, taxes, interest (simple and compound). Omit difficult, puzzling problems.

HISTORY. — Any approved text-book, treated topically and completed in one year.

PHYSIOLOGY. — Taught by the object and oral method. An elementary text-book, which can be completed in one year, may be used.

GRADE IX. (NINTH YEAR.)

READING. — A book on English history, Scott's *Lady of the Lake* and any suitable classics. Any approved Fifth Reader for drill exercises only.

SPELLING. — Same as fourth grade.

LANGUAGE. — Continuation of the work of the fifth grade. Business letters, commercial forms, telegrams, common roots and prefixes.

Incidentally. — Principles of syntax, and grammar as outlined in the seventh and eighth grades.

ARITHMETIC. — Mental arithmetic. Such reviews as are most needed.

Incidentally. — Proportion, square and cube root, mensuration.

GEOGRAPHY. — Physical, political and commercial (one half year). Special attention given to commercial geography, where commerce goes, by what conveyances and routes, over what obstacles, and to

get what; where it goes and where it does not go, and why; the leading railway thoroughfares of the United States, and principal lines of commerce of the world.

BOOKKEEPING. — Single entry, one half year.

WRITING.

Taught during the first year or first three years, as directed, with slate and pencil. As this gives little aid in the use of the pen, it is better to begin the second year with a tracing-book for pen and ink. (The only use for the tracing-book is the better opportunity it affords for fixing the habit of holding the pen correctly.) Particular attention should be directed to this matter at the outset and maintained throughout.

One copy book and one blank book each year. Dictation and memory exercises to be written in the blank books.

DRAWING.

Slates to be used during the first two years, copy and exercise books each year subsequently.

GYMNASTICS.

Appropriate exercises each session throughout the course, observing to ventilate the rooms at the same time.

SINGING.

To be taught and daily practised throughout the course.

MORALS AND MANNERS.

Systematic instruction throughout the course.

MISCELLANEOUS EXERCISES FOR OBSERVATION LESSONS.

During first four years develop the idea of —

Color: — Hues, tints, and shades of color; harmony and contrast of color.

Form: — Plane and solid geometric figures.

Place: — On, over; under, above; before, behind; right, left; etc.

Size: — Large, small; great, little; long, short; larger, largest, etc.

Botany: — Flower, leaf, stem, root, bud, fruit, seed, different kinds of leaves, parts and shapes of flowers, etc. .

Insects: —

Nature: — Sky, clouds, rain, snow, sun, moon, stars, ground, rocks, water, air, wind, dew, frost, hill, brook, stream, etc. Familiar animals and their habits, on land and in the water. The human body, senses, etc.

METHODS.

In all instruction, strive to stimulate natural impulse by investing each subject with attractions in order to make it real. The mere presentation of facts is not teaching, which consists rather in showing the way for their discovery. Therefore, so far as possible, set the pupils to experimenting, furnishing the proper conditions and requiring independent conclusions and statements. It is the first duty to secure confidence, then make every stage of advancement clear and avoid every process which may repress natural activity; better to endure annoyance and imperfection for a time.

READING. — This subject is paramount in importance during at least the first four years, and the habits formed in its early instruction have much influence upon subsequent progress.

Though there can be but one true method there are various processes of teaching reading, the pursuit of any one of which by the intuitive, energetic teacher is likely to lead to success, but the majority of teachers will advance their pupils more rapidly if they teach the full sentence, at the outset, directing their attention to the cultivation of the sense of sight rather than that of sound.

The letters of the alphabet are meaningless in the first stages, single words have little more significance, while the complete sentence is at once intelligible, easy to teach, and aids materially in breaking up hesitancy. When first admitted to school, at five years of age, the child has acquired an extensive vocabulary which he is able to use in full sentences in oral expression, and it is important that he learn to express the same from their appropriate representations in as brief time as possible.

The following method has proved successful, in respect both to the time required for development and to naturalness in teaching: —

Select some twenty or twenty-five words which can be easily represented by objects held in the hand. By means of these secure the attention and gain the confidence of the pupils, then draw out voluntary expressions, but always in good, full sentences. Teach in this way the uses of all the personal pronouns and a few simple verbs and adjectives. The object is to make the children talk. As soon as they acquire the confidence to talk with ease and fluency and to ask questions, — in a few days, a week, or with some in two weeks, — write their expressions on the blackboard, in script. Make the sen-

tences, at first, as simple as possible, using "I have" or "I see" with each of the words represented by objects. The characters will not be recognized at first, but the process is intelligible and, by constant repetition for two or three weeks, two exercises each day, the children will recognize the characters and learn to read. From this step onward the way is easy and full of interest. Add new words each day — not too rapidly — until the end of twenty weeks, when it will be observed that from two to three hundred words have been learned so that they can be read at sight in any easy combination. It will also be noticed that there is no hesitation and that expression becomes as natural as in conversation.

The following arrangement of vocabulary will show the relative number of words which can be taught each month :

First and Second Months.

Object words (represented and taught by means of objects or toys) : Doll, mat, dog, hen, cup, mug, ball, top, jug, cat, fan, egg, nest, bell, nut, box, bird, cow, horse, axe, apple, pitcher, basket, donkey.

Have, see, has, is, put, can, will, run, bite.

A, an, the, red, fat, big, little, pretty.

I, it, my, me, you.

Yes, no, not, in.

Third Month.

Man, boy, girl, lamb, fox, tail, fur, feathers, wool, eye, ear, nose, mouth, head, hair, face, hand, feet, kitten, squirrel, chicken, rabbit.

Do, did, was, are, may, fly, lay, play, hit, like, spin, eat, smell, hear, wash, comb, jump, catch.

He, she, we, our, this, that.

One, two, three, four, five, good, bad, new, old, white, black, gray, right, left, bushy.

Here, there, where, fast, very, too, now, ever, and, on, of, to, for, with.

Fourth Month.

Tree, leaves, grass, hay, fish, boat, water, book, slate, desk, chair, floor, pencil, school, teacher, lady, gentleman, papa, mamma, flower, garden, day, night, bed, morning, evening, Christmas, Santa Claus, present.

Be, saw, grow, get, make, row, swim, read, write, go, say, thank, please, love, buy, give, gave, should, bring.

Six, seven, eight, nine, ten, green, yellow, brown, large, small, dark bright, polite.

Us, your, his, her, him, they, their.

Yes sir, yes ma'am, no sir, no ma'am, why, when, well, at, up, O, if, always.

Teach sentences inculcating habits of politeness, as : "I say 'yes sir' to a gentleman," "I say 'yes ma'am' to a lady," "When I go to bed I say 'good night,'" "When I get up I say 'good morning,'" "I always say 'thank you' and 'if you please,'" etc., etc.

Fifth Month.

Brother, sister, baby, house, barn, home, yard, street, summer, winter, snow, ice, pond, hill, sled, sleigh, skates, mittens, hood, fire, stove, wood, coal, sun, moon, star, sky, rain, wheel, wagon, clock, time, o'clock.

Feel, try, help, let, live, slide, coast, ride, wear, shines, laugh, fall, fell, could, burn, tick.

Warm, cold, pleasant, round, hard, soft, sick, happy, beautiful, young, kind, cross, clear, blue, glad, great, long, some, any.

Who, whose, those, these, what.

By, down, into, out, over, much, how.

Add fifteen easy proper names wherever desired, in any month.

NOTES. — Use the plural forms of the foregoing words, and change declarative to interrogative sentences.

Reviews are to be made by combining the new words with those already learned. These reviews should be continued till all the words are easily and fluently read at sight.

It is believed that three hundred words are as many as can be learned with profit in twenty weeks. It is quite important that the list should be uniform, and the words adapted to the comprehension of the children; otherwise it matters little what words are taught, or whether or not the words are of easy orthography, it having little to do with learning to read at sight.

As soon as the pupils begin to recognize the sentences by their representations they will follow with close attention the process of writing, pronouncing each word as soon as it is written — if allowed — and manifesting enthusiastic eagerness to read it when completed; this enthusiasm should be encouraged and never repressed. They will also very soon manifest a disposition to analyze the sentences, having intuitively discovered that they are not only composed of words but the words of letters. By intuition, also, the letters are learned, and this is the proper time to direct attention to them by the introduction of oral spelling, and assuming that they are understood. They should be taught in their regular order on the slate, subsequently.

It is not easy to hold the attention of large classes at one time in recitation, and progress will be more rapid in proportion as the number is diminished. Let the school be divided into small groups — not exceeding ten pupils in each — and graded according to ability, the lowest receiving the largest share of instruction. In other exercises, the groups may be enlarged according to the circumstances, but the same principle holds true in every recitation as regards small classes. While shortening the duration of the exercises, it serves to quicken mental operations and tends to economy in many ways.

It is a good plan for each group, while reciting, to stand in some convenient place on the floor, to gather about the teacher while she is seated to talk about objects, at the blackboard as she writes the sentences, or on a line when reading from books. If a pupil under-

takes to read before grasping the full thought, he should not be allowed to proceed, but some one should be called on who is ready. The constant use of the pointer while reading will prevent all attempt to begin before the sense is understood.

Do not read for pupils to imitate, if it can be avoided, as it destroys self-dependence and the natural expression of childhood, which it is so desirable to retain, nor call upon them in turn. Let them first manifest their readiness by raising the hand. In this way the exercise becomes very animated, nor will it be difficult to elicit just the right expression desired. The same plan should apply to the subsequent reading from books. Let no exercise exceed fifteen minutes.

THE PRINTED PAGE. — If twenty weeks are spent in learning to read fluently at sight from the blackboard, — during which time about fifty per cent. of the pupils will acquire three hundred words, others two hundred, — much greater progress will be made in books. The transition from script to the printed page is the work of but one or two lessons. Whenever a word is not recognized, write it in script on the blackboard.

Neither skill nor natural expression are acquired by the study of a few pieces, but are rather the result of extensive reading in easy matter. The common reading book is graded too abruptly and should be read neither in course nor fully; short sentences only are suitable for the first year, that the thought may be easily comprehended and precede utterance. Ten different books of like grading are none too many, and small groups of ten pupils render the expense but little more than to supply one book to each member of the school.

Let the lessons be read but once or twice, and the books be allowed in the hands during recitation only; this holds the attention more closely and awakens livelier interest than when they are read in advance; but when the books have been completed they may be used with good effect by the pupils at their desks or in the home. As soon as a group is called for recitation require each period or paragraph to be read in silence — sufficient time being allowed for this purpose — and call upon no one to read orally until he is ready, which will be signified by raising the hand; yet, give all a chance to read during the exercise. Write all new and difficult words on the blackboard before commencing the lesson, and when one word is written cover it immediately with a book, calling upon some one to spell it orally; before erased call for original sentences, which may also show their right use. This is one of the best methods of teaching spelling; requires but five minutes, leaving ten for reading. Aim to have every pupil understand the use and orthography of all the words, but waste no time upon such as are already familiar. Let the pupils read short paragraphs or sentences, frequently looking from or closing the book,

and now and then request one to read the whole lesson, occasionally looking from the page.

If a pupil fails to do acceptable work, or shows a tendency to hesitate, place him in the next lower group, with easier reading, or require him to use again the blackboard and pointer. Whenever a lesson is too difficult omit it until later. Omit likewise all poetry, at first, save to memorize one selection each week.

Do not accept any reading, at least do not pass it by, until the expression is just what is desired. Emphasis and accent, exaggerated expression, is better than monotonous reading.

Publishers have, as yet, offered no books that are better adapted to young children than the graded readers of common use, but an extensive variety is desirable for selecting a proper amount of suitable reading, the choice of which requires considerable caution. Beyond the fourth grade it is neither economical nor wise to depend much upon the reader. The relation of the school to the library is developing a field for usefulness too long neglected.

SPELLING. — Neither rule nor the spelling-book can define the task of the teacher in this study. The line of work is the cultivation of sight, with exercises both oral and written. The first duty is to direct attention to the form of every unusual word at the time of its occurrence, in whatever lesson. The habits acquired by early instruction in reading may aid materially in this direction and should never be entirely abandoned. Constant practice will lead to instantaneous recognition of the orthography of words which years' study of isolated words will not produce. Oral spelling should be practised on all occasions, and a list of troublesome words kept before pupils until they become familiar. The list should be kept in blank books by the teacher and made up from experience. Require the pupils to write in blank books such words as most need their attention. As supplementary to this use the speller, not in course, but selecting according to need and teaching a few of the most common rules for spelling. Let this exercise follow and accompany every reading lesson, associating the words with their uses, but waste no time upon words that are well understood.

DECLAMATION AND RECITATION. — These exercises should be commenced early and continued throughout. Never leave the pupil to make his own selections nor allow indifferent recital. Choose but four to six pupils each week and bestow the necessary drill to make the exercise both entertaining to the school and profitable to the individual. Prose is preferable to poetry, as a rule, and if the selection be too long let a part be learned at each recital until the whole is memorized. A single selection recited with good effect about once in ten weeks by the same pupil, is far more profitable than the more frequent exercise without due preparation.

GENERAL SUGGESTIONS.

Keep the school busily engaged while any portion is reciting. Little children are restless, impulsive, and should not be required to sit still. They may be kept from mischief by various means, such as slate exercises, toys, books, splints, pictures, square blocks of board with holes for pegs, etc., etc. A school is in disorder only when stillness cannot be secured at command, when there is too much noise from whispering or talking without permission. Render such assistance only as will lead to individual discovery. Avoid much talking, ask but few questions. Conduct recitations without a text-book in hand, except when absolutely necessary. Avoid routine; make the recitation alive, interesting. Teach pupils to do with all their might whatever they undertake and let no time be wasted. Prepare beforehand with careful thought each day's exercises. Remember that the early formation of the habit of *well doing* will greatly enhance all subsequent acquirement, while the opposite habit will abide with even greater tenacity and rob instruction of half its value.

A COURSE OF STUDIES FOR HIGH SCHOOLS.

[Prepared by FRANK A. HILL, *Principal of High School, Chelsea.*]

The diverse conditions of the 224 high schools of the State render it impossible to construct a single course of studies that shall be adapted to them all.

Indeed, the essence of a good education is so subtle and indefinable a thing, it involves so much of power and balance and culture, it may spare so much of mere information, that no one has a right to say that there is but one curriculum that is always and everywhere the best.

It is the policy of the State to determine what the general character of the high schools shall be, and to permit a large measure of freedom in the details of organization.

The statutes recognize two grades of high schools. In the lower grade, the master "shall give instruction in general history, book-keeping, surveying, geometry, natural philosophy, chemistry, botany, the civil polity of this Commonwealth and of the United States, and the Latin language." These subjects are "in addition to the branches of learning before mentioned," namely, "orthography, reading, writing, English grammar, geography, arithmetic, drawing, the history of the

United States, and good behavior ;" also, when the " school committee deem it expedient," " algebra, vocal music, agriculture, sewing, physiology and hygiene," which may be taught " by lectures or otherwise."

In the higher grade, " the teacher or teachers . . . shall, in addition to the branches of instruction before required, be competent to give instruction in the Greek and French languages, astronomy, geology, rhetoric, logic, intellectual and moral science, and political economy." Recent legislation has made physiology and hygiene, particularly in their relation to stimulants and narcotics, compulsory.

It seems to be understood that instruction may be legally claimed in any branch in which the statutes require teachers to give or to be competent to give it. Since, however, the demand for instruction in some topics (Greek, for example) may not exist; since the statutes do not require each pupil to take all the subjects which they require the schools to offer; since, moreover, the simple omission of a statute subject from a course of studies may silence any claim that might otherwise have been made for instruction in it; since the absence of a claim to instruction in an omitted topic may often be construed to mean the non-existence of that claim, — there frequently results, in practice, by the side of an honorable endeavor to realize the general spirit of the law, a laxity, which may be more seeming than real, in conforming to its details.

In the interpretation of statutes, principles like the following seem to be generally accepted :

1. If a subject is treated reasonably well in one grade, it may be omitted in another. Thus, if book-keeping be taught in the grammar school, it may be omitted in the high.

2. Subjects may be taught with text-books or orally, at the discretion of school boards.

3. Subjects may be taught if not mentioned expressly in the statutes, provided they are fairly included in subjects required.

4. It is proper, therefore, to introduce the study of minerals, plants and animals into schools below the high, in order to train the observing faculties, to furnish materials for thought and language, to aid instruction in other branches, and to pave the way for that scientific instruction which it is the duty of the high school to begin.

Before arranging the details of a course of studies some difficulties and problems should be considered, some outlines of policy indicated.

Length of the Course. — Experience has fixed upon four years as a suitable period. It is sometimes urged in favor of a shorter time, as well as of subordinating the course somewhat to the younger and larger classes, that the majority of pupils leave school before the expiration of three years, if not of two.

It is true that the number of graduates from the high school averages about twenty-five per cent. of those who enter, rising sometimes to thirty per cent., rarely to forty.

It is a mistake to assume that this falling off is much more serious in the high school than elsewhere. In this aspect of diminishing numbers the educational system is a pyramid, whose slope is more conspicuous in the isolated high school at the apex than in the more numerous grades below. Compulsory education modifies the slope a little near the base. The fact of this shrinkage, so necessary, so universal, so easily explained, should not be used to the prejudice of a generous allowance of time or of a logical distribution of subjects for those who can go through the schools.

It should not be forgotten that a four years' course practically includes a three years' course, a two years' course, and a one year's course. Indeed, the minimum course is usually completed by from eighty to ninety per cent. of the pupils admitted.

Number of Studies per Day. — The average pupil in a mixed high school should not carry more than three subjects per day. Experience seems to have settled upon this number. But pupils fitting for college are often compelled to carry four to meet the demands made upon them.

So many topics are pressed upon the high school for attention, it is so hopeless a task to provide adequately for them all on a three-study basis, that the temptation is very strong to admit them by means of options or of a four-study curriculum or of both.

Many thoughtful persons lament what seems to them a multiplicity of studies even in a three-study programme. An in-

crease from three studies to four involves a heavy increase in the number of classes, in the number of individual recitations and exercises, and in the friction incident to the working of a more complex system, to say nothing of the loss in soundness and efficiency of instruction. If it is sought to meet the evils inevitable to such expansion by providing more teachers, more room, more equipments, the question of increased expense becomes a very serious one. And even if such expense should be incurred, the removal of evils that beset the teacher would leave those that burden the pupil in full force.

Experienced teachers are compelled to admit that when they take special pains to be helpful and stimulating in one line of work, and so succeed in eliciting excellent responses from their pupils, they are forced to spare themselves in other lines. The same limitation holds true of pupils.

The evils of multiplicity, so generally deplored, are due largely to public opinion. However modest and proper many of the demands of the public may seem, when separately taken, their aggregate is overwhelming and discouraging. It is to the lasting credit of the schools that their possibilities are so highly rated; it will be to their lasting injury if school authorities permit the expansion of programmes to outstrip the expansion of the growing mind.

Options. — These are expensive every way. They increase the number of subjects for the teacher; they add to the number of classes; in large schools they often force an awkward division of classes. Often no weightier consideration is given them than that of the immature and ignorant pupil; sometimes they are the refuge of shirks. In a few cases they would be a boon. To deny them would be a hardship to the pupil and his parents; to grant them, a hardship to the rest of the school, unless, indeed, the granting should be accompanied by a corresponding increase in teaching facilities.

It is not the options themselves that are intrinsically bad. There are conditions that justify a few. It is rather the intellectual sinfulness, so very common, of granting options but not providing for them, that merits condemnation. Far better no options than options that reduce efficiency.

There are two important classes of options granted in high schools, — one due to the relation which these schools hold to

the colleges, the other due to their endeavor to satisfy the demands of the anti-classical party. The general course of studies pursued by the great majority of pupils does not fully please either of these parties. It is not classical enough for the former; it is too classical for the latter. The colleges, although they have responded fairly to the scientific demands of the age, are conservative. They require both Latin and Greek of candidates for admission. That general course, therefore, which contains Latin but not Greek, fails to fit pupils at all points for the college examinations. Hence the offer of a choice between Greek and some of the general-course topics, usually the sciences. The omitted sciences are taken in college, so that there is no ultimate loss.

Thus, in numerous high schools there exists what is known as the college preparatory course. This, for economy's sake, is made to coincide at all possible points with the general course.

The extreme opponents of classical learning, going beyond the views of those able scientists who simply desire that their favorite learning shall stand squarely by the side of the classics in the higher education, that neither shall crowd the other into obscure nooks of the curriculum, object to Latin in the high school.

The law is so explicit, however, in its requirement of instruction in Latin, so overwhelming a sentiment of cultured people is behind the law, so many pupils seek that instruction, that there is hardly a high school in the State that fails to offer it. A line of substitutes for Latin is, however, frequently provided, yielding another course of study, commonly named, from its dominant topics, the English course. This, like the college course, is made to coincide, so far as practicable, with the general. The nice adjustment and balance of the sciences and the classics in that general course which, in its grander features, is nearly uniform throughout the larger high schools, proves acceptable to the majority of pupils.

So far as I have observed the workings of the side courses, I have been impressed with their difference in tone. Naturally, more definiteness of purpose, more ambition, more character, more inherited scholarly taste is found in the college course; its subjects are more exacting; its spur to effort

sharper. It is a pathway rich in associations, hallowed by tradition, leading to an honorable goal. Its influence, when it is ably managed, is elevating to a school. Mr. Martin, in his report to the Board of Education last year on "High Schools," says that "probably more students refuse Latin because they think it is *hard* than for any other reason." This accounts, in part at least, for a certain inferiority of tone that too commonly pervades the students in an English course.

When the English course is reduced to two years, and made what is called a "business" course, as has been done in twelve high schools, various reasons unite to make it "nearly valueless for the true purposes of high school instruction," however serviceable it may be for one of a thousand lines of employment.

Options properly belong to years of maturity, to institutions of means. In most high schools more interests are sacrificed by granting them than are saved by denying them. The sacrifice, as has been said, is not due so much to the fact of options as to the inadequate provision too commonly made for them. It is a painful sight to see a small school tottering under an elaborate programme that needs twice the existing force to carry it decently. Programmes are easy to make, hard to execute. The better they look on paper, the harder it is to realize them in practice. It is not wise, therefore, for committees to depart from a single course of study, unless, first, these departures are imperatively demanded, under conditions that committees do not control; and unless, second, there is adequate provision for them when made.

Let there be, then, no line of substitutes for Latin in any school whose efficiency would be reduced by such an expansion. Indeed, when one reflects that this language is required by all colleges; that it is required or recommended by all medical, legal, theological, and high technical schools; that it is successfully required of all in many high schools; that it is chosen by the majority in schools that make it optional; that the law requires every high school to offer it; that most of the objections to the language belong rather to vicious methods of teaching it, to an avoidable squandering of time upon it, to the antagonism which is falsely supposed to exist between it and science, or to the personal experiences of those who have

lacked the power or the inclination to master it and gather its fruits; when one further reflects that the relation of Latin to English, to the vocabulary of science, to the Romance tongues, to the culture of the past and the present, is such that there is no likelihood that the higher institutions will abate their requirements or their recommendations of this language, or that the public will ask them to do so, he cannot but regret the real or imagined necessity that makes it optional in schools that can afford the money expense of the enlarged programme.

Mr. Martin observes that, "after noting closely the mental operations of more than ten thousand students in our high schools in a great variety of subjects," he is convinced that "nothing else can fill the place of Latin in high school work."

It is a matter for further regret that when experience has fixed upon a general course, admirable in its judicious blending of classical and scientific topics, such a course does not connect with the college fully; that no one of the thousands that annually graduate from this general course is permitted, if late-maturing thought inclines him towards college, to cross its threshold without additional expenditure of time and money.

There stands, however, the hard fact that no average mind can fairly meet the demands of the old training and the new in the same course of study, and that further mutual concessions are needed to bring the college and the high school into closer union, so that the former may become accessible to the youth of the State and the latter more successful in concentration of energy, to the strengthening of both and the advancement of the cause of liberal education.

My personal conviction is that a closer union is possible without detriment to the cause of Greek learning, although the quantity of Greek preparation assigned to fitting schools might need to be reduced. Thus, if, with the requirement of Latin from all, it should become possible to meet some minimum requisition in Greek with one year's study, — this to be given during the last year of the course, when work tells better, — most of the difficulties due to options in the less ably supported schools would be obviated. The bifurcation of such high schools would be postponed until the last year. The chasm between the lower grade school and the college would still exist, but it would be narrowed, and more schools would,

doubtless, seek to bridge it. It is certain that a single course of study, with but one option the last year, would mean greater concentration and efficiency for a large number of schools.

So long as options are demanded, I know of none for which stronger reasons exist than for the Greek.

In behalf of an extended Greek course, *in schools that can afford it*, may be cited the testimony of the thirty-six professors in the Berlin University, who, after ten years' experience in receiving pupils from the Realschule as well as from the Gymnasium, unanimously reported that the classical training of the latter furnished a better preparation for the work of the University than the mixed classical and scientific training of the former.

The Gymnasium graduates, they say, are not simply the most successful students in the classics, but they excel just where one, without experience, might suppose they would fail to equal the Realschule graduates; namely, in physics, chemistry, astronomy, and such branches.

Their report may mean that, in the nature of the case, classical training is superior to scientific; or it may signify, merely, that scientific training is in its infancy, and cannot, at present, show so good a record as the classics.

In view of this remarkable unanimity of testimony, I cannot but admit the wisdom of a certain conservatism on the Greek question, — at least, until the problem of securing as thorough training in the sciences as in the classics is nearer solution.

If it be objected to the course of study outlined in this paper, that it has too decided a classical leaning, it is fair, perhaps, to set over against this criticism the fact that the course proposed corresponds in its main features to that of the German Realschule, whose curriculum, containing, as it does, Latin, the sciences, mathematics, history and literature, but omitting Greek, the Berlin professors, science teachers and all, condemn as having too decided an anti-classical leaning, — at least, for university purposes.

The Aims of the High School. — It should not be forgotten that a high school is a *high* school; it should prove worthy of its name. It professes to introduce the pupil more fully to the world of nature, of science, of language, of history, of mind, to give a deeper training, a broader outlook, than in the

grades below. It is the place for what are sometimes called the luxuries of education, but what are really the rudiments of some of its important branches.

So, while it is a fair argument for pursuing certain branches, that they are destined to be useful from probable business stand-points, it is by no means the only argument for them, and may be far from the strongest one. There is a manhood stand-point, as well as a business one, from which values should be studied. There is a mental wealth as well as a material.

High school branches may be roughly classed as information studies and discipline studies: by which it is simply meant that in some studies the discipline value is dominant; in others, the information value. Indeed, it is often a mere question of method, whether a given subject belongs to the one class or the other.

It is the concurrent testimony of thinkers that *power* is the great aim of training. The sciences and the classics have no controversy here as to the transcendent importance of training the young to observe accurately, to infer correctly, to think independently and ably, to express the product of thought with propriety and vigor.

To develop this power requires time and deliberation. Just as a record in cell and tissue by dint of innumerable constructive and destructive processes underlies every habit of body, so in habits of brain and mind the same marvellous law seems to hold. In this great natural fact lies the fundamental reason for that concentration and definiteness of aim with which inflated programmes so sadly conflict.

It is, perhaps, unfortunate that discipline and information are so often contrasted with each other in speech. There is a misleading suggestion in this antithesis. The fact is that discipline does not exclude information. On the contrary, its invaluable service is to determine, as it were, the axes upon which information shall crystallize; to secure that underlying unity, that symmetry that admits additions on any side and may coexist with endless outward variation. There is no education without information, but there is a vast deal of information floating about where there is no education worthy of the name.

The following outline is designed to be simple and flexible.

If there are to be two or three courses, let this be the backbone of the system. Let the others run parallel to this, connect with this, depend upon this; but let this course answer wherever proposed expansions of it cannot be ably supported.

The details of this outline come from experience, from observation of the experience of others, from deference to the statutes, and from an endeavor to harmonize views that frequently conflict. The plan provides, therefore, for history, literature, mathematics, science, and the classics. It presupposes an adequate teaching force, so that there shall be a margin for that unwritten course of study whose details are so baffling to the makers of programmes, but whose high requirements the loyal teacher is earnest to meet.

The number of exercises per week, namely, fifteen, is based on the presumption that the school has five sessions, single or double, in that time.

FIRST YEAR.

Department.	Subjects.	Exercises Each Week.	Time.
English.	Elements of Rhetoric.	Three.	Three Months.
"	Literature.	Three.	Seven Months.
"	Written Work.	—	Ten Months.
History.	General Outlines.	Two	Year.
Mathematics.	Algebra.	Four.	Year.
Latin.	Forms, Syntax, etc.	Five.	Year.
Drawing.	Geometrical and Object.	One.	Year.

NOTES. — 1. Whether time enough is granted for the several topics will depend upon the aims proposed, the limitations recognized, and the methods adopted.

2. Some discretionary power in the management of details is recommended. Thus, if the same teacher has charge of both English and history, he may find it expedient, within the limits of five exercises a week allowed them, to vary the order and the times. This can be done without violence to the spirit of the general requirements. So, too, if the drawing should fall to the teacher of Latin, let the number of Latin recitations be reduced to four, but increase in mathematics to five. It is better that subjects should be assigned to the right teachers than that there should be an iron-clad and indiscriminating observance of details.

3. The topics and the character of the instruction in drawing will depend upon the proficiency of the lower grades. A more elaborate course in drawing is desirable in schools that can grant and pay for options that make it feasible.

SECOND YEAR.

Department.	Subjects.	Exercises Each Week.	Time.
English.	Modern English Authors.	One.	Year.
History.	England.	One.	Year.
Mathematics.	Geometry and Trigonometry.	Four.	Year.
Latin.	Cæsar's Gallic War.	Four.	Year.
Science.	Physics.	Four.	Year.
Drawing.	Perspective and Object.	One.	Year.
"	Projections.		

NOTES. — 1. Among the allowable variations are such as the following: If the same teacher has mathematics and drawing, he may, within the limits of five exercises a week for both, vary the times given to each, provided he retains for the year substantially the ratio of four exercises in mathematics to one in drawing.

2. If pupils fitting for college are not required to take physics, but should study Greek three years, their line of options should begin now. Dropping the sciences, let them take Greek for the rest of the course. So, too, they may drop history, and so much of mathematics as the colleges do not exact. The time thus saved should be most carefully utilized.

THIRD YEAR.

Department.	Subjects.	Exercises Each Week.	Time.
English.	Earlier English Authors.	Two.	Year.
Latin.	Virgil's <i>Æneid</i> .	Four.	Year.
French.	—	Three.	Year.
Science.	Chemistry.	Five.	Seven Months.
"	Botany.	Five.	Three Months.
Government.	Constitution U. S.	One.	Year.

NOTE. — Let Greek be begun this year in schools that cannot devote three years to the subject. The college class should review mathematics

this year, with recitations in school when possible. It should also carefully review the outlines of Grecian and Roman history, already studied, using larger works for collateral reading. At the close of this year the faithful student of good capacity should be able to pass his preliminary examinations (adopting the Harvard requisitions as a guide) in eight topics; namely, the two Latin minima, arithmetic, algebra, geometry, physics, history of Greece and Rome, and French. If he has studied Greek two years instead of one, he would add two Greek minima to the foregoing list, but postpone physics until his final examinations.

FOURTH YEAR.

Department.	Subjects.	Exercises Each Week.	Time.
English.	Literature.	Two.	Year.
French.	—	Three.	Year.
Latin.	Cicero's Orations.	Three.	Year.
Science.	Physiology.	Five.	Four Months.
"	Astronomy.	Five.	Three Months.
"	Geology.	Five.	Three Months.
Political Economy.	—	Two.	Year.

NOTES. — 1. The college class will omit the sciences and political economy. It will continue the study of Greek. It will need special instruction, if it can possibly be given, in Latin and Greek composition, and in such subjects or parts of subjects as it cannot compass in the larger classes of which it is a part. For the final examinations (still following the Harvard requisitions as a guide), the college students will take the Latin maximum, the Greek maximum (certainly, if Greek has been studied three years; possibly, if it has been studied but two), physics (if the two Greek minima have already been passed), or the Greek minima (if physics has been offered). If physics is studied the last year, it should be taken, if practicable, with the second-year class.

2. It is understood that a limited discretion should be exercised for the course, as already suggested for the first and second years.

THROUGHOUT THE COURSE.

Music. — One exercise per week. Let the other exercises be shortened a little on the music day, but none rejected. It may be better in some schools without a special teacher to have music oftener, but with a smaller time allowance for each exercise.

Compositions. — In some schools compositions are regularly prepared on subjects selected either by the pupils or the teachers; they are then criticized by the teachers, and read by the pupils in the presence of the school. It is a better plan, doubtless, if it be systematically followed up, to rely on the regular work of the school for composition practice. Let the pupil reproduce in writing matter furnished by the teacher, expand abstracts, elaborate notes taken, write out reports of experiments performed or work done by himself or the teacher. Let him write out his real thoughts on such live topics within his range as are constantly arising in well-conducted recitations. Written translations of languages studied, to be criticized from the stand-point of good English, are valuable. Illustrated compositions on science topics frequently prove exceedingly stimulating.

Recitations and Declamations. — In many schools these are given regularly from the platform. Most of these exercises are dreary and of questionable value, although in every school there are pupils of dramatic power to relieve the general dullness. If this method is adopted, the selection of subjects should be controlled somewhat, individual rehearsals should be provided for, and the time and enthusiasm of a competent teacher freely given to the work. Such conditions, however, are hard to meet. If met, there are good results.

The benefits of recitations and declamations may be secured more easily and naturally in practice in presenting matter orally, in a sustained way, and in one's own language; in committing to memory and reciting worthy passages from the authors read; and in reading aloud, particularly in the history and literature classes.

To lead pupils to throw their souls into such work requires judicious management, involving the application of two or three fundamental principles too commonly ignored, of which I will speak under another head.

Gymnastics. — Let there be brief breathing and vocal exercises, arm, chest, and other simple movements, from time to time.

Gymnasia and military drill, with special instructors, are permitted by statute under certain conditions.

Miscellaneous Instruction. — If neither pupil nor teacher has

been overburdened, let a few minutes be set apart each day for such important matters as the curriculum does not expressly mention. Let a principle of arithmetic, for example, be presented each day, the pupils performing one or two illustrative examples of a simple sort, and in a month or two a great deal will be revived.

Again, let a receipt be written one day, a note the next, a check the next; let indorsements and negotiability be treated on successive days, and in three or four weeks these forms will be saved from that oblivion to which lack of practice so often consigns them.

Or, again, let there be a month of dictation and correction, with occasional repetition of dictated sentences. Keep the work of a day very brief. Aim for one or two definite things in each exercise.

And so in other lines of review.

Morals. — Particularly is it the duty of the teacher, under this head and at all appropriate times, by timely use of the lives and teachings of others, as well as by precept, example and government, to endeavor to realize the aims of the founders of our public schools, as impressively given in the statutes. For an excellent elaboration of these aims, see the forty-eighth annual report of the secretary of the Board of Education.

This scheme makes no pretension to being an ideal one. Its leading features are in harmony with the statutes and with the results of experience in numerous high schools. The position of some of its subjects may be questioned. Thus physiology is often placed first instead of last in the high school. If studied as an observation and information branch in the grammar school, as now by law required, it should come after physics and chemistry in the high, in order that facts already learned may be scientifically understood. When not studied in the lower grades it is naturally placed earlier in the high school as an information study. So, too, with botany. It has been placed after chemistry, on the theory that its forms have been studied in the lower grades, and that vegetable physiology, which presupposes chemistry, should receive attention in the

high school, as well as development, morphology and classification. Otherwise it should come earlier, that pupils not previously trained to observe shall not postpone too long that invaluable practice.

A course with the numerous subjects proposed cannot receive fair treatment, unless, first, considerable elementary observation work is done in the lower grades; and unless, second, stringent limitations are observed in the higher. If there are but two or three teachers, the numerous subjects are likely to make too heavy drafts upon them for the needed mastery and daily preparation. Hence the necessity, in many schools, for eliminating geology, political economy, astronomy, and other advanced branches, or some of them.

If there are no college pupils, the Latin course may be abridged in its number of exercises, thus increasing the time for other and more crowded subjects.

If an English option for Latin must be given, it may be possible to confine it to one year, by requiring all who may attend two years or more to take Latin, while permitting one-year pupils to substitute for Latin the science of the class above. In a small school this would cause no increase in the number of classes to recite.

Physical geography is not included, because, although interesting, some of its matter belongs to geography in the lower grades, while much else may be distributed among the sciences already provided for.

Book keeping is not included, because, so far as it is meant for the professional book-keeper, there is no sound justification for its introduction, while the elements that are of universal service should be taught in the lower schools.

Both physical geography and book-keeping may, however, be put into an English course, if such a course be demanded.

A statement of subjects, however sensible, is far from being the chief need of a school. Of more importance than the scheme is a sound method for its details, and transcending both scheme and details is the competent teacher. A good teacher can save a poor programme, while there is no programme, however promising, that can save itself at the hands of a bungler.

Latin and Greek. — The order of topics under Latin is usu-

ally the following: Elementary lessons for the first year; Caesar, the second year; Virgil, the third year; Cicero's Oration, the fourth year. Under Greek the following is a common order: Elementary lessons for the second year; Xenophon's Anabasis, the third year; Homer's Iliad, and sometimes Herodotus, the last year.

The best teaching of the high schools, according to Mr. Martin's report, is done in the classics.

Inasmuch as high schools attempt to combine, in the principal curriculum, the classics and the sciences, a most rigid economy should be practised in instruction. There should be no squandering of energy by the wayside.

Principles like the following, positive and negative, should be heeded; or, if not fully accepted, they should be examined for such germs of truth as they may contain:

1. In elementary work let there be as little of the grammar and as much of practice as possible. Forms and principles must, however, be conquered.

2. Get principles into concrete shapes. Let them be applied as soon as learned. It is well enough to know that a verb of persuading takes the dative. It is far better for the pupil to give the Latin at once for such sentences as *I persuade the king, he persuades the king, we persuade him*, and so on, until a knowledge of the principle is derived from its use. Then ring, orally and rapidly, the changes on some Latin sentence that embodies the principle, the pupils translating into English.

3. Do not keep the pupil reciting rules or parsing when his translation reveals that he knows. Grammar should be studied as a means to an end; when the end is attained, waste no time on the means.

4. Shun exceptional forms and usages. The grammar should contain them; let the pupil grapple with them when his need of them becomes apparent.

5. While Latin conversation is neither practicable nor desirable to any great extent, valuable hints about some details of teaching may be obtained from conversational methods employed by skilful teachers of the modern languages.

6. See that the pupil's vocabulary is constantly growing.

Let the English derivatives of Latin words be called for frequently. Let the pupil avoid going to grammar and lexicon on slight incentives. Train him to see that a word may be a dictionary to itself; that the context may be all luminous when the word itself is dark.

7. Do not hesitate to work with a class occasionally in preparing a lesson. Make the class do most of the work, however. The teacher's true relation to the brain-work of his pupils is that of a guide, not of a substitute.

8. Always insist upon translations into English idiom. If a literal or verbal rendering is wanted, to test the pupil's knowledge, call specially for it. If skilful teaching is done here, then here is done some of the best English language work in the course.

9. The main object in studying Greek and Latin is to be able to read them intelligently and elegantly. This great object includes all other objects. Digressions into geography, history, grammar, and the like, may be made, to illumine the text, but they should be limited to such illumination.

10. Frequently appoint persons to read reviews at length, in their best language and style. A page of Cæsar may be read in three minutes; a hundred lines of Virgil, in five.

11. Let it not be forgotten that power to read a text intelligently may exist — nay, in most mature persons that have been well trained in their youth it actually does exist — side by side with a deep forgetfulness or an original ignorance of numerous side matters of that text. The power to translate a word at sight is easily reconciled with the lack of power to give its possible variations. On the other hand, there may be considerable technical knowledge, of a fragmentary character, without the power to utilize it in simple sentences. The art of wise rejection should be studiously cultivated.

History. — The statutes require instruction in general history. The subject is vast; the time limited. The difficulty is that such history can be little more than cyclopedic in its character. Facts are so bare, so lightly touched; there is so little chance for warmth and color, that the subject, if not skilfully handled, sinks into dulness and wearisomeness. Recitations of the text on the one hand, or desultory questions, with their too-often monosyllabic answers, on the other, are of

questionable value, although it is understood that a live teacher can quicken these or any other doubtful methods.

In surveying the world's history, the process should be something like that of the tourist who takes in the country he visits — if he takes it in at all — while swiftly passing through it. Now and then he pauses at an attractive spot for closer study.

Let lessons, then, of considerable length be assigned for thoughtful reading. Such reading is an art, in which instruction should be given. Rely on reports of the class to insure the fact of reading. The dangers of such a method are obvious; but the formal recitation of text is full of dangers as great, if not greater. The object, so far, is the general survey and the general impression. The extent, closeness and value of such a survey depend mainly upon the conscientiousness and grasp of the pupil.

Now, within the limits of the recitation let the *topical method* be adopted. This method has for its object to bring out in stronger relief the more important features of history, and to give the pupil some definite and extended work to do in bringing them out. Let the pupil receive his topic some time in advance, a week or more. If Egypt is the general subject, let the pupil take "The Valley of the Nile," "The Pyramids," "The Egypt of To-day," "A Visit to the Egyptian Room of the Art Museum" (Boston), and so on. Material may be found in the text-book, the school or public library, and sometimes in the home library. The pupil should be the teacher for the time, doing his best to instruct the class. He should be encouraged to care for the matter and the style. If the teacher can get any work from his class, he can get this. In a large class the pupil's turn will come less frequently, but he will have more time for preparation. A fundamental truth in all teaching is, that the pupil's interest in his own work is more likely to be permanent; in that of another, transient. The pupil reading or listening is imbibing, receiving impressions, advancing in a way that is real, although it is usually unsatisfactory to an examiner. The pupil investigating, preparing, studying, with a definite aim, for a definite time and a definite hearing, is doing a higher order of work, that it is utterly hopeless to get from a class as a whole in con-

nection with every lesson that may be assigned. He works more in the spirit of the true teacher.

It need not be said that a system should underlie the topical method. The topic for a lesson might be, for instance, "What the Greeks excelled in doing," the several branches of it to be assigned to as many pupils. Here is an opportunity for the teacher to make clear the elements of a good talk; that is, to give sound instruction in English under conditions that favor an immediate application of the instructions given.

Maps, books of reference, photographs, works on the aims and methods of history teaching, and *time* are essential to fair results.

Mathematics. — It is better to begin algebra with concrete cases, like simple problems whose solution involves equations with one unknown quantity. The pupil usually does such work with zest. The power of algebra is thus revealed to him, so that when he comes to the inevitable abstractions, and is taught that mastery of them will greatly extend that power, he will work with greater confidence and intelligence.

The ends to be gained in algebra are so obvious, the processes so definite and precise, the tests of success so easily and perfectly applied, that the causes of failure are to be sought, not in confusion of views about the study itself, as might easily happen in the case of history or literature, but rather in the difficulty of appreciating and adapting one's self to the slow, immature and erratic reasoning processes of the growing mind. Cases of marked inaptitude in pupils are not infrequent.

In geometry the following suggestions are offered to the teacher:

1. Let him lead the pupil to clear conceptions of space and portions of space, surfaces, lines and points. The forming of right conceptions may be aided by blocks, blackboard work and the like, but the pupil should be able to hold such conceptions geometrically; that is, apart from models and diagrams.

2. Let him try to impress upon the pupil the forceful, the invincible character of a sound demonstration. It is a fortress that cannot be taken. Let a written demonstration be posted occasionally, and the class challenged to find a flaw.

3. Let him encourage original work. A text-book whose

demonstrated work is rigidly limited, but whose suggestions of original work are numerous and rich, is the ideal book.

The management of such work in large classes is perplexing. If it is passed in by the pupils in great quantity, the teacher is over-burdened by the work of examination. It is idle to assign two or three propositions to be originally worked out by all. Real investigation does not lend itself happily to such evenness of assignment; it certainly refuses to yield evenness of results. It is important in such work to keep all busy, to let all be discoverers, to give all an opportunity to report discoveries.

One or two suggestive expedients may be helpful. Let the teacher, for instance, assign a new proposition, and put a diagram (a large and good one) on the board to show clearly what is to be proved. Let him ask those who see the proof to stand and remain standing. One or two may respond at the outset. Then let the teacher ask suggestive questions, pausing after each to give the mind time for working, the pupils answering mentally and rising as rapidly as they see through to the required proof.

After a little practice, it is surprising to note how many will discover a proof, especially when stimulated by one or two well-put queries. Of course, the pupil may sometimes mistake for a demonstration something that is not one. The teacher may pause, therefore, to get the argument into shape, or he may, to keep up the interest and activity of the class, pass rapidly from case to case.

Again, the teacher may present a diagram, inform the class that an important truth about it awaits discovery, and start them in quest of it. Let all possible principles and facts about the diagram be presented, in the hope that the one sought for may be found at last. The class will get it ultimately, or failing, will have done valuable thinking in reviews and explorations. A significant question might save a failure.

4. The language of geometry is exact, free from superfluous matter, logical, direct. It is, in these respects, admirable English, whatever of sentiment it may lack. Let the teacher at times secure concentration upon this ideal; namely, the giving of a demonstration smoothly, without repetition or hesitation, grammatically, with right choice of words, and accurately. Working to attain such an ideal is excellent practice. It is of

double value, for it involves drill in English as well as in geometry. There are ways enough to rule out mere memory or rote work, so that the finished exercise shall come from mastery and self-possession. Not many can attain such an ideal, but it is worth something to show its existence and to lift the class towards it.

5. At times stress should be placed on the neat, orderly and accurate writing of demonstrations. Here, too, is a good chance to do some telling English work. Indeed, there are many points in which English and geometry have a common interest; stress placed on each of these branches helps the other.

6. It is needless to say that diagrams should be freely varied; that designating letters should be changed often and sometimes dropped; that mere memory methods should be discountenanced; that principles should be generously applied; that the power to do original work is a high test of success; and that the teacher should not try for too many desirable things at once.

It would be well if a month or two near the close of the geometry year could be spared for enough of trigonometry to reveal its nature and suggest its possibilities.

An extended course in trigonometry and surveying would be a good subject for an optional English course.

Science. — It is important in all science teaching that the teacher bring his pupils face to face with objects themselves and whatever forces they may exhibit, that the observing powers be exercised, that the reflective faculties be quickened, and that the results attained be expressed orally, in writing, pictorially, or by models, as may seem wise.

Among some of the objects of scientific study are (1) the attainment of some facts at first hand rather than at second; (2) the apprehension of principles, without which facts are of inferior worth; (3) a conception of what it is really to investigate; and (4) a genuine insight into the underlying order and harmony of the countless facts and phenomena of nature.

The laboratory method, which requires pupils to experiment for themselves at desks or tables, is more feasible for chemistry than for physics. There are fewer pupils to deal with; a larger

number can work together; the equipment is less expensive. The method requires that but few pupils, fifteen or twenty at the utmost, and a smaller number for physics, shall work at the same time; that the working period for a section shall be of generous length; and that the teacher shall have little or nothing else than the sciences to teach.

If there is no laboratory, let the teacher, or some pupil previously appointed, perform the experiments. The class should describe what is done, observe, and infer the principle. Pains should be taken to correct errors, and to secure conciseness and brevity of expression, before the record is entered in the notebook.

Occasionally the topic is such that each pupil can equip himself with the simple apparatus required. Thus a laboratory is extemporized.

It should be impressed upon the pupil that the world is a great laboratory, that it is full of phenomena and experiments, that neither observation nor inference can exhaust it. It would be marked success in the teacher to get his pupils scientifically interested in what is doing there.

If the pupil has been trained, by a sound method, to go honestly, patiently, thoroughly to the bottom of a few topics, he may be permitted to touch others lightly or not at all.

Let the teacher aim for such a method rather than to amass and present mere facts or to cover the ground of a text-book.

In the course of the science instruction it is a wise plan to get once or twice a year from the pupil extended written work upon some topic assigned. Let him be encouraged to investigate, to make drawings, to arrange, to write out in his best style, so that his report shall be (as it were) a monograph. With judicious assignment of topics in the line of the pupil's taste or power, excellent results may be obtained from many, particularly if the teacher has work on hand to show as models of what he wants, and will take pains to give suggestions freely, keeping up all the while a steady pressure for a high order of attainment.

Botany offers the finest opportunity in the course for direct study of nature. There is hardly an important principle of the science that cannot be learned from plants themselves. Hints like the following merit attention:

1. Let note-books be kept for observations, at least, in the earlier part of the instruction. Drawings should be made of objects studied.

2. Work from specimens themselves, the pupils reporting discoveries and the teacher furnishing botanical terms as needed. If the specimen presents an important fact or illustrates an important principle, set the class in quest of it. It will not hurt them to spend an entire recitation in the search. Agassiz did not hesitate to let the pupil work for days in hunting down a truth obvious enough after discovery.

3. It is better to know a few plants thoroughly than many imperfectly. Knowing the name of a plant is not knowledge of the plant itself.

4. Secure from each pupil a monograph on some botanical subject. Give time for preparation. Point the way.

5. If individual herbaria are not required, start a school herbarium, and get the pupils to contribute. The flora of a neighborhood may be conquered in a few years.

6. Be sure that underlying principles are seen, — the leaf in the petal, the branch in the thorn, the cell in the tissue, the bond in the species. The diversity of nature is obvious enough to the casual observer; the unity of nature demands study and insight. Training that does not reveal the latter can hardly be called scientific.

In physiology the processes of digestion, circulation, respiration and nutrition should be studied in the light of chemistry. It should not be necessary to pause long on the general structure of the body, the more obvious functions, the leading hygienic laws. These are grammar-school subjects.

If mental philosophy is not studied as a separate pursuit, it would be legitimate to present a few of its foundation principles about attention, sensation, perception, memory, automatic and volitional activity, the laws of habit, etc., in connection with the study of the nervous system.

Here, too, belongs temperance instruction, unless the importance of the subject makes it desirable to give it orally to the entire school at appropriate intervals.

Neither astronomy nor geology can be mastered in three months, or in thirty. The names of these sciences are, per-

haps, too grand for the elementary conceptions that the average pupil can easily gain in the limited time devoted to each.

Under astronomy, study thoroughly the general relations of the earth and its movements to the sun, moon, planets, and stars; the phenomena of day, twilight, night, the seasons, celestial scenery, and such changes in them as are due to changing positions of the observer upon the earth's surface; the methods of computing time, determining latitude and longitude; one or two problems, to suggest how celestial distances are computed, and the like. There is much information that merits, in a three months' course, hardly more than reading. Let the school deal chiefly with what costs work to understand.

In geology, attempt little more than an elementary study of the making of pebbles, sand, clay and soils; the forming of conglomerates, sandstones, slates, limestones and coal; the creation of hills, mountains, valleys and continents; the action of water and air upon the earth; volcanoes, earthquakes, and other movements of the earth's crust; the more common minerals and rocks; the grander types of animals; the nature and teaching of fossils. There is a vast realm of details that cannot be entered.

Government. — Among the different methods of studying the constitution of the United States, the following is commended for trial: —

Let the class be, for instance, a federal convention, duly assembled to consider the revision of the Constitution. Let the teacher preside, with the understanding that he is to give instruction at any time to help on the business. As teacher, then, he may do what a presiding officer is not expected to do. Let the proceedings conform to parliamentary usages; let the clauses of the Constitution be debated, amended, referred, adopted, postponed, or otherwise dealt with; and let records be kept of what is done.

Work should be specially assigned at first; in time the element of spontaneity will appear. A reference library would be freely used by the pupils for this work. Acquaintance with the Constitution, knowledge of parliamentary law, and practice in public speaking are promoted by the successful execution of this plan.

In this connection many could be led to read, with appreciation, an English classic like Webster's great reply to Hayne.

English. — It is easy enough to suggest rhetoric, composition work and literature for the course; to mention for study Irving, Scott and others; to name even the selections themselves most fitting to read. The real course may be very uncertain after all. It merits a deeper and wiser treatment than is possible here. A few suggestions only.

The power to use one's own language lucidly, vigorously, elegantly, ranks among the highest the mind can possess. It is part gift and part training. It is part beyond the reach of the schools and part within it. So interwoven are thought and feeling with language that only a logical mind can use it correctly, a wise one truly, an imaginative one vividly, an earnest one feelingly, a well-balanced one harmoniously.

The over-burdened may find consolation, if they are not teaching English directly, in the fact that they are doing it indirectly in proportion to the grasp, insight and appreciation their pupils show in whatever they study. Still, something should be done directly for English and so rhetoric is placed first, or, if that name be too formidable, let it be language lessons. Not that rhetoric can make a good writer, for it cannot. It simply points out the more obvious merits of good English, the more obvious faults of bad; it furnishes, moreover, the language of criticism for subsequent use. The pupil may get valuable ideas of the excellences and defects of language long before he can hope to acquire the former or banish the latter in his practice. Let points be brought out sharply. Don't push illustrative details too far. Insist, for example, that the pupil shall know what redundancy is, the objection to it, and be able to detect it in simple cases, but waive all intricacies, perplexities, and most of the variations possible under this head. Youth is the time for outlines, frame-works, fundamentals. Have faith in the development of germs. Get speedily to the work of reading literature critically, and of writing.

In formal composition work there are serious difficulties. It is important that each pupil's work should be criticised, corrected by himself, re-examined and so on, until it is in good shape. On the other hand, there is no work so time-consuming, brain-wearying and cruel to a teacher with numerous pupils

and subjects as this. Let substitutes be found at all hazards. If, after the separate features of fair writing have been studied, it is still important (as it is) to lift the punctuation, capitalization, paragraphing, spelling and the like, aim for such things in dictation exercises which pupils can correct under direction.

A systematic plan of having topics written at the board for class criticism would prove valuable. Let the main work of the teacher be done in advance of the writing, in stimulating thought, in suggesting material, in securing analyses, etc. Beware of the abstract and the vast in selecting subjects. They belong to a later stage. The admirable opportunities for composition work in connection with other studies have been mentioned. A single carefully-thought-out and extended exercise under each topic of the course, added to the direct composition work of the youngest class, would give ample practice.

In literature there is much diversity of method. There are strong reasons (1) for reading but few authors; (2) for taking complete productions; (3) for shunning compendiums; (4) for not attempting a history of literature; (5) for beginning with the later writers, American first and English next; (6) for avoiding burdensome impositions upon the pupils.

A good book is a good friend, and the influence sought is that of good companionship. It is a work of art; it will bear study and react on the student.

It should be the aim of the various methods to keep the companionship intimate and friendly, to reveal something of the art. Among the devices for attaining the ultimate aim are: (1) searching questions on the thought and language; (2) the recitation of fine extracts; (3) the assignment of topics for special investigation, such as the more striking similes of a chapter, the quotable thoughts, the Saxon or Latin style, the character of the descriptions, reasons for liking or disliking certain personages, how character is brought out, the more obvious properties of style, illustrations of such properties from the text, paraphrases of certain passages, invention of situations to which quotations may be aptly applied, how different authors express the same thought, etc., etc.; and (4) endeavors to show the unity, completeness, originality, spontaneity, etc., that characterize high excellence.

These are suggestive of other devices. If they keep the

pupil close to the author and busy with him, they have a common motive beneath, however unrelated upon the surface. This common motive of communion with choice writers will forbid, as a rule, exercises that take the pupil far from them.

A real enjoyment of an author, a real appreciation of worth, — these are aims high enough, often too high, for a high school. If the enjoyment exists without the critical power to analyze its sources, it is not a matter for very serious regret.

A scientific analysis of a full course in literature gives a scheme too grand for a secondary school. The development of literature, the relations and classifications of its various branches, — these are for maturity, the specialist, the philosopher.

Conclusion. — It seems to follow from this survey, although it has been restricted to mere hints for the elaboration of a course of study, that the real value of a plan lies not so much in the names and arrangement of subjects as in the essence of the teaching.

In schools with but one or two teachers it is simply impossible to cover every subject as well as a barely tolerable analysis of it would seem to require. Mr. Martin, in his report to the Board of Education on the high schools of the State, says, in substance, that he knows of no more trying position in the whole educational field than that of the principal of a high school, for he must know three, four or five languages, as many branches of mathematics, nine natural sciences, to say nothing of history, literature, government, elocution, music, and drawing; in fact he is expected to be a whole college faculty in one person.

While, therefore, a full course has been outlined in this paper, it is preposterous, from the stand-point of good teaching, to suppose that one or two teachers only can do it justice. The more numerous the teachers, the better the division of labor; the more rigid the limitations, the more feasible the course becomes.

It is better, therefore, with a small teaching force to reduce the number of sciences, to waive some of the higher-grade subjects, to practise the closest economy in the separate subjects and to beware of options. It becomes school boards in such cases to take special pains, while reducing demands for

quantity, to increase efficiency by providing libraries, cabinets, maps, models, apparatus, as well as buildings and teachers.

REMARKS.

The topics enumerated in these courses of studies should be presented to the pupils in the public schools by a true method of teaching. A knowledge of the method may be obtained by a careful study of the mind and of the laws which control its activity. Skill in teaching may be acquired by a consistent practice directed by a knowledge of the right method.

Public school teachers will not be able to satisfy an intelligent public sentiment concerning what the schools should accomplish, unless they have a good understanding of the philosophy and art of teaching. The best teachers in our Commonwealth are generally the most industrious students. Constant study is necessary for the cultivation of the school spirit and for true progress.

It is recommended that the teachers arrange for themselves a course of reading with reference to a knowledge of the human mind, the principles of teaching, the methods of teaching, the history of education, and of the work of eminent educators.

COURSE OF READING.

<i>Subjects.</i>	<i>Books.</i>	<i>Authors.</i>
Psychology, . . .	{ Outline Study of Man, . . .	Hopkins.
	{ Outlines of Psychology, . . .	Sully.
Principles of Teaching, .	{ Lectures on the Science and	
	{ Art of Teaching, . . .	Jos. Payne.
	{ Life and Educational Works	
Methods of Teaching, .	{ of Comenius, . . .	Laurie.
	{ Lectures on Teaching, . . .	Fitch.
	{ Educational Reformers, . . .	Quick.
History of Education, .	{ History of Pedagogy, . . .	Hailmann.
	{ Educational Theories, . . .	Browning.

AGENTS.

The agents of the Board have been constantly at work during the year in visiting the schools of the smaller towns of the Commonwealth and in conducting Teachers' Institutes. Their monthly reports to the Board of Education have shown the nature and amount of service they have rendered. The following are types of these reports : —

ABSTRACT OF REPORT OF G. A. WALTON.

SEPTEMBER AND OCTOBER, 1885.

To the Board of Education.

I shall in this report state the work for September and October.

Towns visited : Blackstone, Washington, Alford, Becket, Richmond, Huntington, Chesterfield, Goshen, Northbridge, Westhampton, Uxbridge and Mendon, — the last named to hold an institute. I was present at the examination of candidates for admission to the Framingham Normal School. The number of schools examined, 78 ; public meetings held, of teachers, 10 ; of people, 10.

School houses : Blackstone, none poor ; Washington, one poor, rest good ; Alford, all very poor ; Becket, average fair ; Richmond, two good, rest poor ; Huntington, fair ; Chesterfield, one new, one wretched, rest fair ; Goshen, three good, one poor ; Northbridge, uniformly good ; Uxbridge, mostly good ; Westhampton, one good, rest poor to fair.

Blackstone and Northbridge furnish teachers with all the apparatus they will use. The schools in most of the towns are scantily supplied.

I was pleased to find in several of these towns a marked improvement where I had noted failures in previous visits ; for example, all the primary schools of Blackstone had been supplied with slates and pencils, and the pupils were industrious with language and number work. Northbridge schools had made progress in penmanship and language work generally. In the former of these towns the outbuildings showed better treatment.

The attendance upon many of the schools is poor ; at Washington some parents complain of the great distance the children have to travel, two miles in some instances, to reach school. The towns of Alford, Westhampton and Goshen have not truant officers, as required by law ; no person, suitable and willing to serve, could be found in the last named town. In most of the towns there are children whose schooling is neglected for want of vigilant oversight of the school committees.

There is a lack of teaching in the schools, a lack of drill and training ; there is too much work which is useless, and some which must tend actually to stultify the pupils. Misses Snow and Smith, one an early, the other a recent graduate of the Westfield Normal School, are doing excellent service in the schools of Becket. They teach by the topical method. Miss Snow is doing much in this town to elevate the standard of teaching.

In reading, the practice is general of giving too little time to reading in First, Second and Third Readers, and too large a proportion to readers of the higher grades. The way out of this bad practice is to introduce supplementary reading of the lower grades. There is a tendency to make this change in the towns. A corresponding improvement is seen in many schools in the language work; the writing of sentences is taking the place of grammar formerly studied by young pupils.

There is a wide range of wages paid to teachers in the towns visited, these going as low as four dollars in some instances, and as high as ten dollars in others in schools of similar grade; and generally the higher priced teachers are the cheaper.

The school appropriations are persistently forced down in some towns, while in others they are truly liberal.

There are frequent changes of teachers in the schools that pay low wages, and generally the teachers in this class of schools are without professional training or experience. A superintendent who is a practical teacher would be of very great service to these schools. Indeed, the committees everywhere profess to feel their incompetency to properly superintend the teaching of the schools; and especially, after seeing the results of the simple tests which I apply, do they admit the need of a practical educator to advise in the many duties devolving upon them. Both committees and teachers welcome competent superintendents. I hope the time is at hand when such aid will everywhere be afforded the committees.

Respectfully submitted,

GEO. A. WALTON, *Agent*.

WEST NEWTON, Oct. 30, 1885.

REPORT OF GEO. H. MARTIN.

OCTOBER, 1885.

To the Board of Education:—

During the month of October I have continued the inspection work begun in September, visiting for this purpose five towns. Four evening meetings were held, three of which were addressed by the secretary of the Board.

In three of the towns I have held afternoon conferences with the teachers and committees.

All of these towns are rural communities with ungraded schools, widely scattered. The teachers are untrained, and are following, in the main, the traditional methods. The primer is the first and the

only instrument in the hands of the youngest children. In a few schools I note a tendency to introduce written language work earlier than was formerly done.

I have found no supplementary reading in use, but young children calling words quite glibly in advanced reading books. The absence of thought in the reading is only equalled by that in some city schools where the so-called phonic method is largely used with the early introduction of diacritic marks.

I find scarcely any objective teaching. No means for it are furnished by the school officers, and no call for means is made by the teachers.

A feeble beginning has been made in the teaching of physiology. Both teachers and committees are much in the dark as to means and methods. There is no teaching of drawing in any of these schools. These defects are due more to ignorance than to indifference, and criticisms and suggestions are welcomed. The committee generally admit the need of more efficient supervision than they can give. They would be glad to have more frequent visits from the State agents than they now receive.

In addition to the inspection work, I have during the month attended the meetings of four educational associations, — those of Bristol and Worcester counties, at each of which I read a paper; the meeting of the New England superintendents, and the conference between the representatives of the colleges and of the preparatory schools.

The latter meeting was made interesting by the frank expression of mutual dissatisfaction; the preparatory schools complaining of the college requirements, and the colleges criticising severely the work done in the fitting schools, declaring it to be characterized by a lack of "thoughtful thoroughness."

The significant reply was made, that as the colleges had trained the preparatory teachers, the responsibility for defective work was on the higher institutions. Both the criticism and the reply sustain the opinions expressed in my last annual report.

I have also during the month taught in institutes at Mendon and Edgartown. Both were well attended, and much interest was shown in the work. Indeed, I think there has never been a time when the teachers were so eager to learn of better methods, or so ready to adopt them.

Respectfully submitted,

GEO. H. MARTIN, *Agent.*

MONTHLY REPORT OF JOHN T. PRINCE.

To the Board of Education :

During the past month I have visited the schools and held meetings both day and evening in six towns, as follows: . . .

It will be seen from the inclosed detailed report of the condition of the schools, school buildings, apparatus, etc., that some difference exists in these towns in respect to the condition of the schools, and to the facilities for carrying them on. In three of the towns the buildings are poor, and the appliances of nearly all of the schools such as to make good work difficult, if not impossible. In some of the schools of these towns no apparatus was seen, not even an outline map, and the blackboards were both small and unfit for use. In — the average wages of all the teachers is five dollars a week, two teachers receiving only three and one-half dollars a week. The salaries paid in the other towns are higher; but in all three towns whose schools are so poor, the salaries are so low that the committee are compelled to select the teachers from those who have received only a district school education. Under such circumstances it can hardly be wondered at that there is no improvement in the schools, and that teachers have little idea of teaching, beyond setting tasks from books to be memorized and recited *verbatim* by the pupils. The examinations in these towns showed that, with the exception of a few naturally bright children who would learn without schools or teachers, the older pupils of the schools could not read well at sight a piece in the Second Reader which they had not seen before, and could not perform problems involved in an ordinary errand at the grocery store.

In the other towns visited, while some of the faults mentioned were found, the schools on the whole were better, and the buildings and apparatus were in a much better condition.

The cause of this difference of condition lies, I believe, not so much in the difference of desire for or appreciation of good schools, as in the difference of ability to raise money for the schools. Take for instance the town of — which I have just visited, and whose condition is not unlike that of scores of our country towns. It has a very scattered population, whose wealth consists almost wholly of the not over-fertile farms. There are over eighty miles of road in the town to be kept in repair, and there is the interest of a war debt of twenty thousand dollars to be paid. Although the school buildings were almost ready to fall to the ground, and the apparatus and teaching were of the poorest kind, I had not the heart to advise an increased taxation for the schools when the rate of taxation already was twenty-four dollars on a thousand. Even with this burden, the people showed

their interest in the schools during the past year by voting to build two new school houses.

In view of the educational needs of the smaller towns, and the difficulties of supplying them, would it not be well to urge upon the legislature the advisability of giving additional assistance under certain conditions? The plan of district supervision is heartily indorsed by school committees everywhere, and if money could be appropriated by the State for this object I have no doubt that it would be of the greatest service, and that the improved condition of the schools would be seen by all.

Respectfully submitted,

JOHN T. PRINCE.

The agents of the Board are able to render valuable assistance to those towns that have no school superintendents. Much of the internal work of the schools will be left undone or will be improperly done if skilled agents are not employed. Among the duties of school boards is that of arranging the topics of study. This requires learning and experience, as will be seen when we turn our attention to the results that may be attained by the use of topics well selected and properly arranged and taught.

1. One result will be found in the acquisition of the right kind of knowledge.

2. The knowledge acquired will be arranged in the mind in its right relations.

3. The acquisition of knowledge in this way is favorable to the natural development of the mind.

4. A right method of teaching will bring the true objects of knowledge before the learner's mind, direct the study of them, and at the same time leave the pupil to independent labor in thinking and choosing.

The school committees need advice in selecting teachers and text books, and assistance in training young teachers in their places. They require help in keeping up the school spirit, and in enlisting the sympathy of the people in the well-being of the schools. The service which the agents are able to render shows the necessity and value of permanent local superintendence.

Mr. Carter has spent his portion of time devoted to public work, in guiding the teachers in their efforts to introduce draw-

ing into the public schools. His labor has been attended with good results, and seems to be fully appreciated both by school committees and teachers. Drawing is the industrial element that the State has introduced into its public school studies. The pursuit of this branch of learning trains the perceptive powers, the imagination, the judgment, and cultivates the taste. It contributes to penmanship, and lays the foundation for the constructive arts. On account of its educational value and the facility with which it may be presented, it should be introduced into all the schools of the Commonwealth. The success of Mr. Carter's efforts the past year affords encouragement that at no distant day instruction in drawing will be given in all the schools.

NORMAL SCHOOLS.

The Normal Schools of the Commonwealth were established for the professional training of teachers for the public schools.

The statistics of these schools, together with the reports of the success of their graduates, proves them to be in a highly prosperous condition.

STATISTICS.

YEAR BEGAN IN SEPTEMBER, 1884, AND CLOSED IN JUNE, 1885.	FOR THE YEAR.	
	Number of Students.	Number of Graduates.
Bridgewater,	197	47
Framingham,	116	30
Salem,	259	53
Westfield,	155	19
Worcester,	139	36
Total,	866	185
Normal Art School,	139	10
Number receiving certificates,	—	62

It should be the aim of the Normal Schools to teach the best methods of teaching the branches of learning which the statutes require to be taught in the public schools; to direct the pupils to the principles upon which the methods are founded, and to present something of the history of education.

In communicating a knowledge of the best methods, the pupil teacher must be led to a careful review of the various subjects that enter into a course of studies, to their logical arrangement in the course, to a list of topics in accordance with which the different subjects are to be presented in the public schools and to a right method of teaching.

The principles of teaching are found in a knowledge of the phenomena of the human mind. In the Normal School, the mental phenomena which the human mind is capable of producing should be made an object of intelligent study for the purpose of finding in the laws that regulate them a philosophical method of conducting all school exercises. It is the special work of the Normal Schools to inquire into the principles of teaching, and to acquire skill in their practical application.

Experience is necessary to the right understanding of general principles. For this reason the history of education should be made a prominent object of study in every training school for teachers.

Such a history includes an account of educational institutions and methods of instruction, covering the period which has elapsed between ancient and modern times. It includes also an account of the labors of those prominent educators that have invented theories and established systems of education, in accordance with which the schools of different nations and times have been organized and conducted. Under this division of Normal School work the attention of the pupil teacher should be directed to the history of popular education, as controlled in the past by the laws of the State, by the rights of the family, and by the decrees of the church.

The three general topics to be mastered in a training school for public school teachers are: 1. A review of the branches to be taught, for the purpose of organizing a system of instruction, and learning the best methods of teaching. 2. The principles of teaching upon which methods are founded. 3. The history of education.

From the nature of the work the Normal Schools were appointed to perform, it appears that their classes should be filled with intelligent persons having obtained already from the preparatory schools a good academical education, and from nature an earnest devotion to the objects of their chosen profession.

It does not seem to be in accordance with the true spirit of professional schools for teachers, that they should find it necessary to teach their pupils the arts of spelling and penmanship and reading, and of performing common arithmetical problems. This is the work of the preparatory schools; besides, the present course of two years is too short a time for the accomplishment of the twofold task of teaching the subjects enumerated in our public school courses of instruction, and in teaching the methods by which they should be presented to the children.

It is an encouraging fact, however, that high schools are now furnishing a larger proportion than formerly of the candidates who apply for admission to the Normal Schools. With such materials, these schools can limit themselves more fully to their legitimate work.

Our Normal Schools have done a great work for the State. They have furnished the source from which our solid improvements in school teaching have been derived. They first directed attention to the ends which school exercises should be adapted to produce. They begun in the State that reform in teaching which requires the use of the right occasions for ideas and for the exercise of the faculties. They have made emphatic the fact that human development is of more consequence than knowledge.

Normal School graduates are now to be found in some of the schools of almost every community in the State. Nearly one-third of the teachers in our public schools have a professional training. The other two-thirds have been more or less affected by good examples.

As the well-being of the schools requires that they be conducted by those who have been trained in the philosophy of education, or have had a successful experience in teaching, it would be economy of the highest kind for the school authorities of the towns to select, from the successful graduates of their higher public schools, young persons who desire to become teachers, and encourage them to complete their preparation for teaching by a course of professional study in one of our Normal Schools.

REQUISITES FOR ADMISSION TO THE NORMAL SCHOOLS.

The successful pursuit of pedagogical study requires a high order of natural talent, and a good knowledge of the branches of study pursued in the public schools. The examination of candidates for admission to the Normal School should present a good test of physical and mental power, of scholarship, of common sense, and of moral character. If the candidate is found wanting in these things, he should be dismissed for so much time at least as will be required by him to prepare for examination.

REQUISITES FOR GRADUATION.

A clear understanding of the ends which school life should be adapted to secure.

A thorough knowledge of the public school studies.

A full comprehension of the principles of teaching.

A practical acquaintance with the best methods of conducting all school exercises.

That power of self control, without which one cannot control others.

An intelligent enthusiasm, without which the highest success in school teaching can never be attained.

Graduates of the colleges, who intend to teach, will find it for their advantage to take a short course, if no more, in a Normal School. Here they can make a review of their forgotten common school studies, and obtain hints which will direct them in their future study and practice. By such a course they will be more likely to find ready employment in good places.

SCHOOLS FOR SUPERINTENDENTS.

It will soon be the policy of the towns in the Commonwealth to appoint superintendents over all their schools.

School superintendents, as well as school teachers, require a preparation for their peculiar duties. They are expected to be able to make out proper courses of studies, to choose the best means of teaching, to introduce the best methods, to establish a rational form of school government, to select the most ap-

proved text-books, and to understand everything that pertains to a well-conducted school.

There is now no special provision for such instruction as is adapted to prepare superintendents of schools for the discharge of the duties of their office. The cause of popular education would be greatly promoted, if some one or more of our Massachusetts colleges would establish a department for the special training of school superintendents. If this cannot be done, classes may be formed in our Normal Schools in which such training may be given.

The establishment of this department of instruction will elevate school superintendence into a distinct profession, and call into the service of the common schools the best educational talent we have in the country.

TEACHERS' INSTITUTES.

Two kinds of institutes have been held during the year, — one, as in other years, for the benefit of the teachers of a group of adjoining towns, the other for the teachers of single towns. Of the former, six have been held, at the following places : —

Winchendon, attendance of teachers and committees,*	.	70
Mendon, " " "	.	104
New Salem, " " "	.	35
Edgartown, " " "	.	26
Northampton, " " "	.	137
Hanson, " " "	.	144

Exercises have been given at these meetings, as follows : —

By J. W. Dickinson, on	Principles of Teaching.
By Geo. A. Walton, on	{ Arithmetic.
	{ Penmanship.
	{ Reading.
By John T. Prince, on	{ Language.
	{ Programmes and Course
	{ of Studies.
By Geo. H. Martin, on	{ Geography.
	{ History.
	{ Political Science.
By A. C. Boyden of Bridgewater, on	{ Arithmetic.
	{ Physiological Effects of
	{ Alcohol.
By Mrs. G. F. Guild of Marblehead, on	{ Primary Organization.
	{ Primary Teaching.

Beside the regular exercises of the day session, an evening lecture has been given in connection with each institute. The speakers have been the Secretary of the Board, on The School System of Massachusetts; Mr. Geo. H. Martin, agent, on A Practical Education; Rev. A. D. Mayo, on Country Schools.

Both the day and evening meetings have been largely attended by the citizens of the towns, and much interest has been excited.

The meeting at Edgartown was especially gratifying both to the conductors of the institute and to the friends of education in Dukes County. For several years the lateness of the season at which the meetings have been held, bringing cold and storms, has prevented the teachers of the island from gathering in force. This year all things seemed to be favorable, and the institute was attended by seventeen of the twenty-three teachers of the county, and by nine of the fifteen committeemen. Gay Head was the only town not represented.

It is hoped that the results of the meeting will be to awaken a deeper interest among the people and to encourage the teachers and school officers to continued efforts to improve the schools.

The second kind of institutes, to which most of the time has been given, is an enlargement of the scope of the agency work.

The agents of the Board, each by himself, or with the secretary, visit individual towns, inspect all the schools in company with the local committee, afterward meet the teachers and committees, and spend the whole or a part of a day in conference concerning the condition and needs of the schools. At these meetings criticisms are made on existing defects in buildings, equipment and methods of work, plans are proposed for remedying the evils, and illustrative exercises are given upon methods of teaching.

In addition to this, in most of the towns, the people are addressed in the evening by the secretary or agents, or both.

This form of institutes has given general satisfaction, and the committees and teachers everywhere speak of them as stimulating and helpful.

The following towns were selected at the beginning of the year for this work: —

BERKSHIRE Co. — Alford, Becket, Clarksburg, Dalton, Florida, Monterey, Mt. Washington, New Marlborough, Richmond, Sandisfield, Savoy, Washington.

FRANKLIN Co. — Bernardston, Buckland, Erving, Gill, Heath, Leyden, Monroe, Rowe, Shutesbury, Sunderland, Warwick, Wendell.

HAMPDEN Co. — Agawam, Hampden, Holland, Montgomery, Southwick, Wales.

HAMPSHIRE Co. — Chesterfield, Goshen, Greenwich, Huntington, Pelham, Westhampton.

WORCESTER Co. — Ashburnham, Auburn, Berlin, Blackstone, Bolton, Dana, Dudley, Gardner, Leicester, Mendon, New Braintree, Northbridge, Oakham, Oxford, Paxton, Phillipston, Shrewsbury, Southbridge, Sterling, Sturbridge, Sutton, Templeton, Uxbridge, West Boylston.

NORFOLK Co. — Dover, Medfield, Needham, Norfolk, Wellesley, Wrentham.

MIDDLESEX Co. — Chelmsford, Dracut, Tyngsborough, Sherborn, Stow.

ESSEX Co. — Amesbury, Andover, Essex, Groveland, Hamilton, Lynnfield, Methuen, Middleton, Newburyport, North Andover, Peabody, Wenham, West Newbury.

BRISTOL Co. — Berkley, Freetown.

PLYMOUTH Co. — Hanover, Kingston, Hull, Marshfield, Pembroke, Plympton, South Scituate.

SUFFOLK Co. — Winthrop.

The agents began in September in the towns of Berkshire County, and have been working eastward; Mr. Prince taking the northern towns, Mr. Martin the southern, and Mr. Walton the central.

Already numerous requests have been presented by towns not on the above list to have similar work done for them. These will, in time, all be reached.

MORAL EDUCATION.

It should not be forgotten by the public school teachers of the Commonwealth that human development is education. A symmetrical development of the human mind includes a facility

of judging correctly of the moral quality of human conduct, and an inclination to do what is thought to be right.

The occasions that direct the attention of the children to the right and wrong of their acts, are examples and precepts. Young persons are affected by the examples of those who have authority over them, and of those whom they are disposed to imitate. More mature minds are influenced by examples, and by a knowledge of general truths, which are the products of their experience and their reason.

The relation which good examples hold to the moral training of the young renders it necessary that parents and teachers should be models of moral excellence.

The power of a virtuous life cannot be overestimated. It convinces the reason more effectually than verbal arguments, and it never fails to modify the character of other lives with whom it may be associated.

General truths in an honest mind are necessary guides in forming opinions concerning all general courses of conduct, and they are none the less necessary in what are sometimes considered to be exceptional cases.

If one accepts the general truth, that deception is always wrong, he will not be likely to confuse his mind by a reasoning process to prove that under certain circumstances it may be right.

If truth is admitted to be a first principle in morals, it will follow that circumstances have nothing to do with it, in suspending or modifying its controlling power. After such admission, the mind is simply to find the truth and accept, without hesitation, the obligations arising from its perception.

Let all the virtues be nobly illustrated for the young by the good examples of those in authority over them. Require these examples to be imitated with the spirit of a true obedience to rightful authority, until virtuous habits have been formed and the time has come for directing attention to those moral principles which are the foundation of all right rules of moral conduct. This is the natural and the simple method of presenting moral instruction. It is the only method of successful teaching. If it is skilfully employed, it will furnish the children with that experience and those precepts which are the rational and safe guides in the performance of the duties of life.

I desire to call attention to the elementary course of studies prepared by E. H. Davis, superintendent of the public schools of Chelsea, and to the scientific course prepared by Frank A. Hill, principal of the Chelsea High School. These courses were prepared by special request, and, as they are the products of experience as well as of theory, they must be of great service to school committees, superintendents of schools and teachers.

In the Appendix will be found an instructive account of the last year's experiences of the agents of the Board of Education; a discriminating paper on School Supervision, by Dr. A. P. Marble, superintendent of the public schools of Worcester; some interesting returns relating to the practical working of the Free Text-Book Law, and collected by William Connell, superintendent of the public schools of Fall River; and an able paper by Dr. Larkin Dunton, principal of the Boston Normal School, giving an account of his observations made in the common schools of Germany.

These papers will be read with profit by all educators, and by those interested in promoting the cause of popular education.

JOHN W. DICKINSON.

FINANCIAL STATEMENT.

FINANCIAL STATEMENT OF THE BOARD OF EDUCATION.

DR. CR.
 APPROPRIATION FOR SUPPORT OF NORMAL SCHOOLS.

1885.	1885.	Appropriation, chapter 46, Acts of 1885.	\$63,176 00
Bridgewater Normal School:			
Salary of principal, . . .	\$2,600 00		
Salaries of assistants, . . .	9,731 80		
Janitor service, . . .	230 00		
Watchmen, . . .	535 50		
Printing, . . .	103 50		
Repairs, . . .	138 13		
Advertising, . . .	88 77		
School of Observation, . . .	501 33		
Fuel, . . .	384 00		
Laboratory service, . . .	75 00		
Apparatus and chemicals, . . .	76 49		
			\$14,464 52
Framingham Normal School:			
Salary of principal, . . .	\$2,400 00		
Salaries of assistants, . . .	7,398 24		
Janitor service, . . .	645 00		
Rent of Haven House, . . .	385 00		
Repairs, furniture, etc., . . .	628 58		
Advertising, . . .	93 31		
Fuel, . . .	424 52		
Printing, . . .	46 00		
			12,020 65
Salem Normal School:			
Salary of principal, . . .	\$3,000 00		
Salaries of assistants, . . .	8,970 00		
Janitor service, . . .	400 00		
Advertising, . . .	119 88		
Repairs, . . .	225 07		
Chemicals and apparatus, . . .	87 47		
Gas, . . .	27 50		
Heating apparatus, . . .	126 55		
Water, . . .	49 50		
Fuel, . . .	302 95		
			13,308 92

Westfield Normal School:			
Salary of principal, .	\$2,600 00		
Salaries of assistants, .	6,249 76		
Janitor service, .	499 92		
Gas, .	35 06		
Apparatus, .	20 27		
Water, .	10 00		
Repairs, .	354 65		
Advertising, .	40 87		
Stationery, .	51 86		
Fuel, .	517 74		
Chemicals, .	13 97		
Printing, .	61 00		
Watchman, .	132 00		
Fire grenades, .	62 50	10,649 60	
. Worcester Normal School:			
Salary of principal, .	\$2,600 00		
Salaries of assistants, .	6,590 76		
Janitor service, .	600 00		
Fuel, .	391 43		
Ice, .	32 06		
Repairs, .	714 31		
Printing, .	162 65		
Stationery, .	90 07		
Telephone, .	30 42		
Advertising, .	99 25		
Water, .	14 02	11,325 00	
Balance of appropriation unex-		\$61,768 69	
pended Dec. 31, 1885, .		1,407 31	
		\$63,176 00	\$63,176 00

FINANCIAL STATEMENT OF THE BOARD OF EDUCATION — CONTINUED.
APPROPRIATION FOR NORMAL ART SCHOOL.

Dr.				Cr.
1885.		1885.	Appropriated by chap. 46, Acts of 1885,	\$16,210 00
Salary of principal, .	\$2,400 00			
Salaries of assistants, .	7,717 43			
Janitor service, .	480 00			
Advertising, .	80 50			
Fuel, .	601 32			
Water, .	42 00			
Repairs, .	25 74			
Gas, .	108 30			
Printing, .	79 15			
Rent, .	3,600 00			
Taxes, .	752 64			
		\$15,887 08		
		322 92		
		<u>\$16,210 00</u>		
Dec. 31,	Balance unexpended, .	.		\$16,210 00

Dr.	APPROPRIATION FOR AID TO NORMAL PUPILS.			Cr.
1885.		1885.	Appropriated by chap. 46, Acts of 1885,	\$4,000 00
Amount paid:				
Bridgewater school, .	\$179 17			
Framingham school, .	145 83			
Salem school, .	583 34			
Westfield school, .	645 83			
Worcester school, .	145 83			
		\$2,000 00		
		2,000 00		
		<u>\$4,000 00</u>		
Dec. 31,	Balance unexpended, .	.		\$4,000 00

FINANCIAL STATEMENT OF THE BOARD OF EDUCATION -- CONTINUED.
APPROPRIATION FOR AGENTS OF THE BOARD.

Cr.

Dr.

1885.		1885.	Appropriated by chap 46, Acts of 1885,	\$9,390 00
	George A. Walton, salary,	\$2,250 00		
	George A. Walton, expenses,	358 69		
	George H. Martin, salary,	2,250 00		
	George H. Martin, expenses,	469 04		
	John T. Prince, salary,	2,250 00		
	John T. Prince, expenses,	368 79		
	Charles W. Carter, salary,	999 96		
	Charles W. Carter, expenses,	212 44		
			\$9,158 92	
			231 08	
				\$9,390 00
Dec. 31,	Balance unexpended,			

Cr.

APPROPRIATION FOR TEACHERS' INSTITUTES.

Dr.

1885.		1885.	Appropriated by chap. 46, Acts of 1885,	\$2,000 00
	Expenses of Institutes at:			
	Winchendon,	\$51 50		
	Mendon,	70 42		
	Edgartown,	39 35		
	Hanson,	57 27		
	Northampton,	49 93		
	Brockton,	37 55		
	Local Institutes,	25 00		
			\$331 02	
			1,668 98	
				\$2,000 00
Dec. 31,	Balance unexpended,			

FINANCIAL STATEMENT OF THE BOARD OF EDUCATION — CONCLUDED.

DR. APPROPRIATION FOR INCIDENTAL EXPENSES OF THE BOARD. CR.

1885.		1885.		
School registers and printing, .	\$454 00			
Stationery and postage, .	224 80			
Messenger and expressage, .	264 50			
Paper and twine, .	21 43			
Tabulating returns, .	100 00			
Telegrams and papers for report,	41 50			
		\$1,106 23		
		93 77		
		<u>\$1,200 00</u>		
Dec. 31,	Balance unexpended, .			\$1,200 00

DR.	1885.		1885.		CR.
Paid Abby W. May, .	\$16 28				
" E. B. Stoddard, .	41 00				
" M. B. Whitney, .	76 15				
" A. A. Miner, .	19 43				
		\$182 86			
		217 14			
		<u>\$400 00</u>			
Dec. 31,	Balance unexpended, .				\$400 00

C. B. TILLINGHAST, *Treasurer.*

APPENDIXES.

A.

REPORT OF GEORGE A. WALTON,

AGENT OF THE BOARD.

REPORT.

To the Board of Education :

The chief part of my time during the year, has been occupied in visiting schools, and in meetings of the teachers, committees and people of the towns visited. I have, as heretofore, attended teachers' conventions and institutes, and have made visits to all the State Normal and to other training schools.

With the limited number of teachers' institutes held during the year, I have visited more schools and towns, and held a larger number of meetings than for several years past. At no previous time have my observations taken so wide a range. My visits to the schools began in Essex County, were continued in Middlesex, and, commencing again in the fall, embraced towns in Berkshire, Hampshire and Worcester. Though made quite largely to the schools of small towns, many visits were also made to those of larger towns and cities. I have been able to see most of the schools in the towns visited, so that I have seen schools of all grades and many with no proper grading.

In my visits I have usually been accompanied by committees and superintendents ; my daily notes contain a record of the names of teachers, with their previous schooling, whether at college, academy, normal, high or common school ; of the length of time of teaching in their present location, also the time they had previously taught ; of the number of pupils enrolled and present ; of the character and condition of the house and room, whether properly lighted, heated and ventilated, whether amply supplied with good blackboards and apparatus. Note is also made of the condition of the out-buildings, whether exposed or protected, clean or foul ; and in schools for both sexes, whether one or two.

I have studied the relations of teacher and pupils, to learn whether the latter act in obedience to wise authority or conform to arbitrary rules. I have observed the pupils' habits, whether of industry or idleness; the modes of study and recitation; the teachers' methods of teaching, whether calculated to induce patient observation, careful reflection, candid and independent expression, or whether the pupil is blindly following a mechanical round of exercises and merely committing and reciting words. After witnessing some of the regular exercises, I have submitted written tests for points not revealed in the ordinary work of the class. The results of my observations will be the basis of this report, as they have been for suggestions at the meetings of teachers, committees and people.

At these meetings I have very candidly stated the defects with the excellences of the schools, and freely made suggestions calculated in my judgment to secure for them a fair estimate of their work and needs. The meetings of teachers and committee have been fully attended, and in most instances those of the people also. Many audiences have been gratifyingly large. My criticisms have been kindly received by all.

EDUCATIONAL PROGRESS.

A circular, prepared by a committee of the Massachusetts Teachers' Association, propounding certain questions to superintendents and school committees for the purpose of ascertaining what progress is making in education, was issued the present year. The questions had reference chiefly to the grading of the schools, to courses of studies, and to the methods in elementary reading, and composition. The replies, from the school committees' point of view, so far as they go, represent the schools and their methods as seen and reported from year to year by the agents of the Board. Of 346 towns and cities interrogated 140 responded, — 40 reporting no course of studies and no grading; one adding, what is known to be quite generally true, that the teachers go as they please, "hit or miss."

Not to anticipate the report of the committee above referred to, but to introduce a few suggestions, not wholly new or original, upon the need of more effective school supervision, I propose briefly to consider some of the evidences of educational

progress, also some of the hindrances to progress, which have come under my observation during the past year.

Is there any real progress in education? Progress in education implies more useful knowledge, and increased facility in using the powers of the mind, as the result of better methods of teaching and study. These ends the schools are designed to reach. In a large class of towns, there are many conditions unfavorable to educational progress. The vital question is, How can these conditions be favorably modified? Among the means necessary to good schools are, comfortable schoolhouses, eligibly and conveniently located, properly furnished, and supplied with the means for teaching; a suitable number of well-disposed pupils in regular attendance; and teachers of good physical and intellectual ability, and of high moral character, with professional training or successful experience, and tact for teaching; also, a public in hearty sympathy with the schools. To secure most of these conditions is easily within the power of wealthy and compact communities. They are beyond the reach of a considerable number of the small towns.

PROGRESS IN SOME PARTICULARS.

Yet even in this class of towns there is progress. If we compare the schoolhouses with what they were at any former period, we shall find that there has been a steady improvement. Recent advance is seen in towns like Richmond, Washington, Becket, Chesterfield and Goshen, where one by one the old houses are transformed, or replaced by new ones. With the renovation is introduced the modern desk and seating. In part this is to be credited to the abolition of the district system, which has also facilitated the uniting of small schools.

With these changes has come better treatment of school property. The new building, with its tasteful and comfortable fittings, commands the respect of the pupils. I am sure much greater care is taken to have schoolrooms ventilated by such means as are provided. More rooms are rendered attractive by simple decorations, by autumn leaves, pictures, colored cards, and like devices.

It is a satisfaction to note some improvement in the buildings belonging to the schoolhouses. These are more frequently

made the object of care by the teachers and committees, and kept from outside trespassers by lock and key.

Progress is indicated by the better equipments for teaching found in many schools. In some the history of progress can be traced in the different pieces of blackboard which have successively been placed in the school as demanded. Many rooms are entirely surrounded by excellent blackboard surface. More schools are supplied with globes and maps; very many have charts, numeral frame, blocks for teaching form, and a variety of other means for illustration. In the towns of Becket and Westhampton I found sets of expensive apparatus for teaching fractions and mensuration; in Northborough, seeds germinating, for teaching the elements of botany. Two towns visited, Blackstone and Northbridge, wisely pursue the policy of furnishing the teachers with all the apparatus they will use.

In some high schools in these towns there are cabinets of minerals and other specimens, while there is an annual outlay for physical and chemical apparatus. The pupils and teachers make pieces of simple apparatus for illustrative purposes, — a practice which cannot be too highly commended.

As a result of the free-text-book law, the pupils are better supplied with slates, pencils, pens and paper; books for supplementary reading are being introduced into the schools; and in some a long-felt want is being met, the upper classes are furnished with dictionaries, one for each pupil.

Attendance upon the schools in some instances has evidently been increased by reason of the free supply and use of text-books. Regularity of attendance is stimulated, in many of the towns, by the vigilance of the school committees, many of whom publish in their reports the names of pupils that have been neither absent nor tardy during the year or term. The laws relating to truant children are more and more fully enforced. And, in the factory villages especially, children requiring certificates to work in the mills are quite regular in their attendance during their twenty weeks' term.

Better provision is made for truant children. I have visited, during the year, several institutions to which truants are sentenced for short periods of time. The Industrial School at Lawrence is one of these. It has accommodations for thirty boys. The City of Lawrence furnishes about twelve, on an

average, and a limited number is received from other places. This institution, with its small farm, its industrial training, its systematic instruction, its home with parental discipline, under a board of devoted trustees, impressed me as the home of a well-ordered and happy family. It is a sign and assurance of progress, the philanthropic spirit which tenderly provides for this unfortunate class of children. The Reform School at Westborough, under the humane and rational management of Superintendent Joseph A. Allen, by the neatness, industry and decorum of its inmates, seemed more like a community of persons acting under self-imposed laws than like a reform school. It is deeply to be regretted that Mr. Allen has resigned the position of superintendent of this institution.

Great pains are taken, in many towns, to secure the best teachers the committees can find, without regard to local or individual preference. There is a tendency to select trained teachers, normal and others, wherever the means at command will permit. The pay in many of the towns is fair. Committees are coming to realize that it requires ability and peculiar tact to teach a primary or a small district school. Accordingly, I learned that in Marlborough extra wages are paid to induce competent teachers to take schools in the outer districts.

Progress is most evident in the discipline of the schools, and this is true of the schools of every class. A healthy stimulation has taken the place of compulsion. Instead of the brutal appeal, once so common, instead of that spirit of repression which formerly brooded over the school, there exist friendly relations, and the amenities of social life are observed between teacher and pupils. Corporal punishment has become as unnecessary as it is unpopular. At no time have the people taken a more intelligent interest in the schools. Horace Mann once said, if he wished to disperse a mob he would call an educational meeting. At the present time, with proper notice, in most towns, the people in fair numbers can be brought together to discuss educational topics and matters pertaining to the schools.

The growth and increasing popularity of training schools for teachers is an unmistakable sign of progress.

The Normal Schools were never before so full as at present, and the demand for normally trained teachers is greater than they can supply. These teachers find themselves less and less

trammelled in practising the most advanced methods. Though but few of the teachers remain long in the towns that pay low wages, the results of their training indirectly affect the schools in these towns, through other teachers, who observe their methods and catch their spirit.

The work of the several excellent training schools, established in the cities and large towns, though less comprehensive than that of the Normal Schools, is yet very effective, especially in fitting the otherwise untrained teachers to teach in the elementary schools.

Though committees seldom go abroad in search of means for improving the schools, suggestions for their improvement from those entitled to consideration are readily accepted and adopted. In a former visit to one of the larger towns, the use which the primary schools could make of writing materials was brought to the notice of the committee; in my recent visit I found every child well supplied with these, and in general making good use of them. In a former visit to another town, the need of more training in oral and written language in the first years, was emphasized; in my recent visit, the results of tests in this kind of exercises were twenty to thirty per cent. better than before. When I visited another large town in June, I urged the necessity of greater vigilance in the care of the out-buildings; returning in September to address the teachers and committee, my attention was called to these buildings, — a complete renovation had taken place.

In my recent visits to certain towns I made a special point of teaching the young children to read with expression, illustrating with the classes in the schools. As the committees declared, the advantage of this and the necessity for it were never before so forcibly brought to their minds. I shall be surprised if, as the result of my simple illustrations, the schools in these towns do not improve in this direction.

School committees are usually selected for the confidence reposed in them by their fellow citizens and for their ability in practical affairs. As a general thing the duties they are selected to perform, they wisely distribute among themselves, and these they conscientiously discharge. It is only in respect to needs vital to the schools, for which many have not the time or skill, and for which none are paid, that the school

committee system fails. Of this I shall say something further on.

The above are not the only particulars in which progress is making. Slowly but steadily the schools are being graded, classified, and provided with courses of studies. A course of studies particularly to be commended is one prepared with much care by Dr. Webber for the town of Millbury.

More attention is bestowed upon teaching, methods being more generally adopted that are calculated to train the powers of observation and imagination, and to present proper occasions for all forms of mental activity. But what is already stated will suffice to show that there is progress even where the conditions are least favorable.

SOME HINDRANCES TO PROGRESS.

Under this head, I desire to give illustrations of obstacles to progress, presented by some schools which I have visited during the past year. It may serve to enforce the necessity for the State's fostering care, and especially for providing a more efficient form of supervision than that by school committees. These illustrations will be given under the topics, schoolhouses, small schools, school furnishings and apparatus, attendance, means of support, teachers, principles and methods of teaching, and school committees.

Schoolhouses. — Turning to some of the small towns, we find schools keeping in ill-contrived, dilapidated, untidy buildings. In such I have, during the past year, seen pupils sitting upon narrow boards without support for the back, and with feet dangling above the floor. The desks are placed against the wall upon three sides of the room; and whilst the older pupils, facing these, are suffering with the cold, the younger pupils, surrounding the stove, are sweltering with the heat. This is one type of several styles of old-fashioned schoolhouses in which schools are still kept. Two of the three in one of the small towns are of this pattern; while the third, though more recently built, fully matches them in its many signs of neglect. In addressing the people I could not refrain from telling them the town ought to be indicted for cruelty to her children.

I have seen, during the year, a number of schoolrooms whose capacity affords less than one-half the air demanded for good

health; one gave but 84 cubic feet of air space per pupil; another, but 72; another, a recitation room, but 30; while health demands 250 cubic feet of space per pupil.

Many of the rooms visited are poorly ventilated, and many, too, imperfectly lighted. A prevailing fault consists in having the light in front of the pupil. One room, in a house comparatively modern, 28 feet by 30 feet, had, to 15 feet of floor space, but one foot of window; while the ratio of space for lighting to the floor surface, should be as one to six or eight.

Among the questions discussed in town meetings, those relating to the abandonment of old schoolhouses, to the readjustment of school districts, and to the formation of union schools for contiguous towns, are most prominent. I was called to advise about the location of a union school, where the towns interested have been contending for more than two years; and, while the children get no relief, the contention still goes on.

Small Schools.—The great number of small schools kept in many of the towns is a hindrance to educational progress. In eight towns visited, upon the Hoosac and Berkshire Hills, the average attendance to a school was but fifteen pupils. Of course many of these schools must be too small to excite great enthusiasm in pupils or teacher. Three schools visited had severally three, two and three pupils belonging; the first of them had but one present the day of my visit! The abolition of the school is always attended with difficulty. "It will depreciate property in the neighborhood," "involve transporting children;" "numbers may increase" or "the school may abolish itself." The house is there, so the little school is retained. To keep down the expense, a cheap teacher is hired, or the school term is shortened. Many schools are kept the bare twenty-four weeks required by law.

One city visited divides its schools from the highest to the lowest on the basis of sex. By this plan several conditions which result impede educational progress.

Furnishings.—The furnishing of many schoolhouses is less complete, and far less conducive to comfort, than that of the well-to-do farmer's kitchen; there is a single chair and a desk for the teacher, but no chair for the visitor; no table, a bruised and rusty stove with bricks in place of legs, and other furniture to match, with not even a clock or thermometer.

Want of apparatus is a characteristic of many schools; no blocks, no numeral frame, no globe, no maps, nothing of the kind, did I find in full half the eighty schools last visited. Forty-one were marked deficient in blackboards; most boards were short in quantity and of poor quality. Some were mere bits of board, rough planed, and covered with paint and varnish. Several new buildings have the boards badly located. A special fault is, that none are placed on the front wall, their use for teaching purposes being wholly overlooked. It is rare to find a district school with any kind of reference books, if the unabridged dictionary be excepted. This serves the entire school for purposes of pronunciation and definition, and would serve equally well if the school were much larger, so little is it consulted.

Attendance. — Among the above conditions are some that tend to lessen the school time of the children, and to make their attendance irregular. To these may be added the neglect or indifference and sometimes the cupidity of parents. In some towns no provision is made for enforcing the truant laws. In several towns I have found one or two families of children whose schooling is almost wholly neglected. And so the number of school children enrolled is fifteen or twenty per cent. less than the number of school age in the town. And in many schools, and in some entire towns, out of the pupils enrolled, twenty to thirty per cent. are absent.

Means of Support. — In some of the small towns, the schools are much restricted for the means of support. Sometimes the lowest motives seem to prevail. For example, in several places visited, I learned that, at every town-meeting where school appropriations are to be made, citizens who vote liberally for all material interests persistently strive to keep school appropriations down, and this for the reason that they do not appreciate an institution which appears not to affect them personally. So a few illiberal-minded persons often cause serious embarrassment to the schools.

An act of the legislature of 1884, having for its object the improvement of the schools of the small towns, made a new distribution of a portion of the income of the school fund. In some instances the towns reduced their appropriations on account of the additional sum apportioned them by this act. So

that instead of helping the schools, the money went to relieve the tax-payers. This parsimonious and niggardly policy characterizes some towns whose school tax could be doubled without becoming burdensome. They are among those that rank lowest in the table of ratios of valuation raised for the support of schools. Such parsimony is not often manifested in the large towns and cities. Yet, in a city school, kept for primary children, at the time of my visit, on a cold day in winter, only six children were present out of twenty-three belonging, and these with their teacher were gathered about a small salamander stove in the corner of a room of capacity for fifty children. Such a condition of things needs no comment.

There are towns, and their number is not insignificant, that are relatively poor; the population is scattered and decreasing; farms are abandoned or held by families that have to struggle for existence. The number of schools in proportion to the number of children is large; the taxes for other purposes are heavy. When these reach twenty or more dollars on a thousand, it can hardly be expected that the school tax will much exceed what the law requires. Such towns deserve sympathy, and should have some relief.

Teachers. — Another obstacle to educational progress is the great proportion of inexperienced and unprofessional teachers employed. One-third to one-half—a majority in some towns—have been teaching less than one year. A young person—in many instances, one who has just completed the studies of the district school—is employed to teach in his own or a neighboring district. The wages are too low—four or five dollars a week—to command trained teachers. Here and there, among the hill towns, there is a Normal graduate; but many towns have not one. High schools in the vicinity sometimes try, by forming special teachers' classes, to give the necessary fit. But I do not find that a novice in teaching, coming from the high school, has much knowledge of the philosophy of his work, or much skill in teaching elementary branches to young children.

With a large class of teachers the whole period of service is very brief. They have time to make a few crude experiments upon the children, and then they seek some more attractive or lucrative position or employment. And this were well, if their places could be better supplied.

In visiting many schools which I had previously visited within six or eight years, I saw few teachers that were teaching in the same schools; few, indeed, that I had ever met before. In one town, five out of six were keeping their first term in their several schools; in another, all the teachers had been less than a term in their present places. In an important village school, I was told that, for a long period of time, the teacher has been changed nearly every term.

Want of professional zeal is a serious fault, or rather shortcoming, in the class of teachers I am considering. They have had no special training to excite their enthusiasm, and if they had zeal it would be without knowledge. They do not read books or periodicals pertaining to the theory and practice of teaching. They do not attend teachers' conventions for instruction. Addressing a corps of fifteen to twenty teachers, just after the meeting of the Massachusetts Teachers' Association, recently held at Boston, alluding to some interesting exercises presented, I found that no one of the teachers of this town, not thirty miles distant, was present; yet in that meeting were presented carefully arranged exercises to illustrate the very topics these teachers are daily teaching. There are, say, ten thousand teachers in the State; by estimate less than one thousand in all attended this convention. It is fair to presume that not more than one hundred and fifty came from thirty miles away, and that the large proportion of those who came this distance were superintendents, classical and high school teachers, heads of grammar schools, or persons drawn thither by social relations. That so few of the teachers most needing the instruction availed themselves of the opportunity does not promise much for educational progress, so far as the body of the teachers is concerned.

Studies. — One who sighs for the school of the "three R's," need only remove to some of our school districts to enjoy its full benefit. For it exists to-day as literally as it ever did. Arithmetic, reading and writing, the latter in the most restricted sense, engage the whole time of many a teacher.

The obstinacy with which the elementary schools resist the introduction of teaching in the elements of natural science, is almost as great as years ago, when Agassiz said, in substance, that we could not have scientific men in this country, for the

reason that the foundations for scientific research were not laid in the elementary schools. These elements are especially adapted to train the mind through the powers of observation, and so to fit it to pursue all studies by a scientific method. It is believed that a judicious introduction of these studies would go farther than anything else can, to train the pupil to the use of his active powers, and so fit him for any study or occupation in practical life.

Principles and Methods of Teaching. — Some principles of teaching are constantly violated by untrained teachers. Proper objects are not presented to occasion ideas. Rules in arithmetic are learned before any illustration of the process is seen. The pupil begins geography by reading a book; before he sees a globe or has observed the natural features of his own village, he begins to study a map. In this and other studies the pupil learns to repeat the expressions of others, rather than to think and invent expressions for himself. He analyzes problems by a formula; he seldom makes the problem, or gives it independent solution. He is plied with questions; he does not take a topic and unfold it. In many of the schools little is done to train the pupil to describe a natural object, or to arrange in logical order the items of a letter or other writing. And the power of fluent, systematic and accurate description is but rarely cultivated.

If we take any one branch taught, — for example, reading, — we shall find but little progress in methods of teaching. The A, B, C method quite extensively prevails. The young child is still required to spell out each word as he reads; he stops at a comma and counts one, at a period and counts four, and so on; he is directed to keep his voice up at one mark and let it fall at another. He calls the words of piece after piece, through the successive books of a prescribed series, till he knows them by heart, and is thus soon in reading beyond his years. The exercise becomes an irksome task and is performed in the most senseless way. It would seem that the preliminary work is to stupefy the child, and then to train him to read to the sense. It is much as it was under the old heroic practice in medicine: first, the system was depleted; then, at great disadvantage, nature was allowed to begin her curative work. In the reading the unnatural process is too often followed to the end.

The teachers in the higher schools complain that the student cannot study because he has not learned to read. The supplementary reading sometimes attempted in these upper schools, to make up for the deficiencies below, is, by reason of these deficiencies, seldom a success.

I find no special exercises for training the vocal organs, and for the correction of faults in reading and speaking quite prevalent both among children of foreign and of American parentage. To realize how little effective training is given to the ear, an organ directly concerned with vocal culture, one has only to note the various spellings of a simple word by children who use the word orally, but have never before spelt it. A want of purity of tone is common among the school children. The training in this direction is wholly neglected; and sometimes bad habits are induced by the constant demand made upon the pupil to read and speak louder.

But it is not necessary to go further into the details of the failures of the schools in the several branches. These have been made sufficiently prominent in former reports by myself and the other agents. It is enough to say that my observations the past year repeat the experience of former years. In the teaching of all the branches, in the class of schools under review, there are two general faults: first, a want of thoroughness in the fundamentals; and, second, a tendency to commit and repeat words without comprehending the ideas they represent. And these are likely to continue, so long as the schools are committed to teachers without training or experience, and without intelligent and constant direction.

School Committees. — All educators are agreed that schools without skilled teachers are about worthless; they are equally agreed that, without good superintendence, good teachers will not be secured or retained and that poor ones will not be improved; hence, in all countries having a system of public schools, two things are provided for at public expense, the training of teachers and the employment of persons to direct their work. The less training, the greater the need of skilful supervision. With us the supervision of the schools devolves upon school committees; these are chosen for a term of three years. The committees, like the teachers, are liable to hold office for short periods of time. Four out of six towns recently

visited have changed their committees entirely within six years. The majority is often changed in less time. With this change is liable to come a change of policy; the text-books change, the course of studies undergoes modifications, the methods and the studies change; the former committee favored singing and drawing, the present deem these to be ornamental branches; the former favored written, the present prefers oral spelling; one prescribes more mental the other more written arithmetic; one would have more oral teaching, another a strict adherence to the text-book; one gives language teaching the preference, another relies upon the study of grammar to secure correct speaking and writing. And it is possible that the umpire in neither case is entitled to have an opinion.

Many committees rarely visit the schools, some never; they go no farther than to attend to prudential affairs, and be present at the stated meetings of the Board. The selection of one from each school district, the custom in some towns, is worse, so far as concerns the employment of teachers, than the system recently abolished, which permitted prudential committees to nominate the teachers. By the present plan the nomination is equivalent to an election; under the district system the nominee was not sure of a single vote and was often rejected.

Yielding to the demand of the people, the policy of the committees is quite largely to employ home talent for teaching; it is generally cheaper, but what is saved is often at the expense of the school. I find the appointment of teachers is frequently made without previous examination. The opinion seems to prevail that one who has passed over a prescribed course of studies is fitted to teach them. I sometimes find the least experienced teachers in the town experimenting with a village primary school, or practising upon a mixed school in an outer district, — two kinds of schools erroneously thought to be least important, or least difficult to teach.

The schools present some needs which most committees find it difficult to supply. Among these are courses of studies and direction in methods of teaching. But few of the towns have a definite course of studies; many, indeed, no prescribed course whatever, beyond a very generally understood outline of the branches to be taught. Where a teacher is employed who has not the ability to frame a proper course of studies or to arrange

a suitable programme, the school lacks grading, classes multiply, and, almost inevitably, the school makes a profitless run to the end of the term. When this is reached, the teacher retires, to await a re-election, or perhaps to repeat his experience in another place.

Referring again to the recent convention of the Massachusetts Teachers' Association, it may be assumed that out of the two thousand persons, more or less, serving on school committees in this State, not twenty attended that convention. Few ever attend such meetings, and, as I am told by teachers, some discourage the attempt of teachers to practise in their schools what they have learned in the school convention, because they, the committees, are not able to see its import.

These strictures are not made to disparage the office of school committee, but to intimate that it is charged with duties which are beyond its powers, and hence that little progress can be expected where the office is not supplemented by some means to make up for its inherent deficiencies.

Where towns are thus restricted in the means for making good schools, with poorly constructed schoolhouses, little apparatus, irregular attendance, a partial and one-sided curriculum of studies, methods which ignore important principles of teaching, untrained, inexperienced and itinerant teachers, and inadequate supervision, the inference is inevitable that there can be but little progress. That under the circumstances the schools do not retrograde is a wonder.

SUPERINTENDENTS THE GENERAL NEED.

Aside from the improved discipline of the schools, it will be noticed that the particulars in which progress is general, as stated in the first part of this report, are largely upon the material side. They are in the equipments for teaching rather than in the teaching itself. Improvements in the methods of teaching are mostly limited to individual schools, often to some one branch of study in a single school, the work of a trained and skilful teacher. Occasionally superior results are reached in a particular branch by all the schools of a town; these results can usually be traced to some member of the school committee who is, or has been, a practical teacher; one who is somewhat permanent in his office, and who, bringing his skill

in this, his favorite branch, to bear upon all the teachers of his charge, succeeds in indoctrinating them with his methods and in communicating his enthusiasm. What this one committee-man does for this particular branch, for the schools of this one town, is what needs to be done for all the branches taught and for all the schools of every town. Towns may be found where superior results are reached under the school committee system. But with an approach to unanimity, school committees themselves admit their inability to direct teachers in the methods of instruction; they readily welcome to their aid the superintendent of schools, whose special duty it is, and this is a good sign of progress.

The replies to the committee of the Massachusetts Teachers' Association which indicated progress, were largely from cities and towns employing superintendents. These are generally towns of dense and considerable populations. As population concentrates, the school system becomes more complex. As wealth accumulates it is made possible to employ specialists for special departments and better teachers for all. With the complexity and the means in hand, efficiency and economy everywhere dictate the employment of an expert to superintend.

The office of superintendent implies superior ability in organizing and directing the work of the schools. With the office everywhere comes better grading both of schools and studies, better teaching and more skilful training. The most noticeable result is seen in the elevation of tone given to the schools as a whole, and especially to the lower classes and the backward pupils. No one will claim that the superintendency tends to make geniuses; it may be fairly claimed for it that it does tend greatly to elevate the mass of the children. Its first work everywhere, has been to improve the primary instruction, its best to level up the lower portion of the school and the class.

This it does through rational methods. Through objective teaching and slate work it stimulates the powers of observation and imitation; through the consciousness of something done, it stimulates the desire for power; through the consciousness of something learned, it stimulates the desire for knowledge; by a proper recognition of effort, it gives zest to the endeavor of the humblest child. Under this system the schools begin to

deal with realities ; less and less is the mind treated to abstractions. The mind is developed, instead of being crammed with senseless symbols. The educating influence of the various studies is kept in constant view. To this progressive work, in the last twenty-five years, the superintendents of schools have given an impulse whose value is beyond estimate. To this source we are to look for even greater progress in the future.

Another has said that the great problem is to supply cheaply, and in sufficient numbers, competent teachers. The Normal and training schools are doing what they can to meet the demand, but they do not go far enough nor fast enough. The State expends, say \$200, to fit a teacher at the Normal School, and the money is well expended, for every one keeps a better school than he would have done without the training, and most pay the State a large dividend for the investment. But the teacher will probably leave teaching in a few terms or years, and an untrained teacher will take his place. Suppose, at the same time that the Normal School graduated a teacher, it had sent out a superintendent who had power to mould, inspire and instruct a corps of teachers, in a few years we should have, as the result, fifty skilled teachers keeping good schools.

It is everywhere true that good teachers are found where there is the right kind of a superintendent. Where the means at hand will not command, he makes them. Let this office become universal, the number of good teachers is sure to increase, and the schools will everywhere make progress.

The office must be made sufficiently remunerative to enable a person to devote his whole time to the supervision of the schools. It is necessary for the superintendent to be a good teacher, at least theoretically. His office should be as free from unnecessary changes as the agency of a mill, or as the presidency of a college. His duties are to assist the committee in all ways to improve the schools, — by keeping alive the school spirit, reporting plans for school buildings, preparing courses of studies, advising and assisting in the selection of teachers and of text books, and especially by directing the teachers in the methods of instruction. By his superiority, and by virtue of his office, the superintendent is to be principal teacher of all the schools of his charge.

Every city in this State, with two exceptions, employs a superintendent of schools ; many of the large towns have adopted the plan ; sixty-five permanent superintendencies exist, and in no instance, with a single exception, to my knowledge, has the office ever been given up. The law authorizes the union of towns for a supervisory district, or two or more towns may, by concerted action of the school committees, elect the same person to superintend, and apportion the time and pay of the superintendent among the towns. Instances of this plan have existed, and have proved very satisfactory. Canton and Walpole are superintended by the same person ; so are Milton and Quincy.

But how are the superintendents to be trained ? The answer is, in the colleges, where chairs of pedagogy are maintained, and especially in the Normal Schools. Some of the State Normal Schools are well provided with all the means for training persons to superintend. Nor need the training be limited to men. Here, as in other parts of the country, women possessing executive ability and literary acquirements could qualify for doing effective work as superintendents. We have had examples of successful women superintendents in our State, as formerly in the town of Blandford and now in Dover, and of the same character, at present, is one of the Boston supervisors.

It is impossible, under present circumstances, to supply every school with a good teacher. But there is no serious difficulty in the way of placing a well-trained superintendent in every town in the State. With the ability which characterizes the large class of our teachers as persons, under efficient supervision our schools will match the best in the world.

What seems a necessity, in order that uniform progress shall be made throughout the schools of the State, is that the system of superintendency shall be extended to all the towns. As seen, the system is fully established in most of the cities and in many large towns. Others, as fast as they are made aware that their schools are not keeping pace with their neighbors', will, one after another, adopt the plan. With these it is an easy matter. The committee, wishing to be relieved of duties they cannot perform, and convinced of the advantage of employing a skilled agent as their executive, ask authority of the

town to appoint such an officer; the town grants the request. There then remains to the committee the duty of selecting and fixing the salary, just as in the case of a teacher. But, in the small towns of six, eight or ten schools, the case is different; the initiative has to be taken by one or by several of the committees of a group of towns; concerted action of the towns is necessary; one town may prevent the union. If the committees secure the votes of all the towns, there may be difficulty in uniting upon one suitable person to superintend; the apportionment and pay of the superintendent present another obstacle; and so, to the present time, few unions have been effected.

While the plan of employing superintendents is generally approved by school committees, here and there are found those to whom the difficulties seem insurmountable. Some anticipate difficulty in securing a suitable person to superintend; some are debarred by the additional cost to the town. Some do not realize the defects of their schools, or the excellence of others in comparison. The towns, and in many instances the committees, need to be aroused to the defects of the schools, and to the necessity for greater effort, and especially for greater pecuniary sacrifice to keep them abreast of the times.

Possibly, substantial aid to a certain class of towns, by the State, would help them to overcome their inertia and avail themselves of this important adjunct to the school committees. It is not for me to suggest a method for bestowing such aid, but, as I visit the schools from day to day and year by year, I am more and more impressed with the necessity of some more adequate means of supervision than at present generally exists, or can be had in a large number of sparsely settled towns without substantial aid from the State.

Respectfully submitted.

GEORGE A. WALTON.

BOSTON, Dec. 31, 1885.

B.

REPORT OF GEORGE H. MARTIN,

AGENT OF THE BOARD.

REPORT.

To the Board of Education :

I have to report, for the third year of service as your agent, the same division of labor as in other years, into institute work and inspection.

I was occupied during the first four months of the school year in teaching in the thirty-four institutes held under the direction of the Board. The remaining time was spent chiefly in inspecting the schools of Barnstable and Dukes counties. With a few exceptions all the schools were visited. At various times, when these schools were not in session, I visited for purposes of comparison about eighty city schools in Boston, Lynn, Somerville, Malden, Lowell, Taunton, Fall River and Worcester.

In all the towns but one I met the teachers and committees, and spent several hours in discussing the condition and needs of the schools. During the year I have also visited all the Normal Schools.

The school buildings in the two counties visited are respectable in external appearance, comfortably furnished, provided with blackboards, and almost all supplied with maps, globes and dictionaries. They have the defects in heating and ventilation common to most of the school buildings of the State. The schoolhouses, out-buildings and yards in many of the villages are exceptionally well cared for by the local committees. A few towns suffer in these respects by comparison.

The school committees are giving to the schools a large amount of faithful service, much more than they are paid for.

ATTENDANCE.

There are many indications that the schools are in a transition state. They have put on the forms of the new system, but traces of the old are everywhere apparent. The old system was based on regularly intermitted school attendance for a

long period, — winter schools until the pupils were twenty or more years old. The new system is based on constant attendance for a short period, — for eight or ten months in the year until the children are fourteen or fifteen years old.

Now, with many of the pupils, the school period is not only short but it is broken into by frequent absence. My notes show that one-sixth of the pupils registered were absent at the time of my visit. Many do not attend the early autumn school at all. Others are absent a day or two in a week, or a week at a time. In the spring the irregularity is greater. One result is inequality of attainment. There are many boys from twelve to fifteen years of age who are very ignorant. Under the old system they would have continued in school for four or five years, and might make up some of the deficiencies. Now they will find no companions of their own age, and will drop out as soon as the law will allow. They are cut off from the advantages of the old system and do not receive the full benefit of the new.

There is some danger that the culture of the children will be subordinated to the culture of cranberries. Throughout the cranberry districts the school year is arranged with reference to the fruit season. In some places there is no fall term; in others the schools keep through August and the early part of September, then are suspended until December. Others begin about the first of November. On the edges of the district some of the schools are nominally in session, but the children are on the bogs.

It may be that the existing arrangements are the best that can be made, but they certainly involve a loss of school privileges. The autumn months are the best for study and they cannot be abandoned without detriment. I look with some apprehension at the extension of the cranberry district into the southern part of Plymouth County, where the schools already have more hindrances than they can contend with successfully.

LOCAL INTERFERENCE.

Another survival of the old district system is a tendency to local interference in the school management. The smaller the district, the more marked is this tendency. If the teacher is a native of the district there are personal and family prejudices

which hinder her success. If she is a stranger she is the chief object of interest and attention; she is closely watched, "all her faults observed, set in a note-book, learned and conned by rote to cast into the teeth" of the school committee. There is much unintelligent criticism of methods and injudicious talk in the presence of the children. The authority and influence of the teachers are undermined, and the only remedy is a change of teachers.

This evil is undoubtedly diminishing, but I have found it serious in many districts. It has always interfered with a proper classification of the schools. Parents have dictated the books which the children should use, and the pages from which they should recite. "My child shall not be put back," has been the dictum of the parents, and the teachers have yielded for the sake of peace.

The free-text-book system will have a decided tendency to check this evil. The distribution of books being in the hands of the teacher, substitutions can more easily be made, and classification can be based on attainment rather than on pages covered. Better still, it will be easier to wean the pupils from the exclusive study of text-books.

PRIMARY WORK.

Still further traces of the old ideas appear in the low estimate put upon primary work throughout these counties. This is by far the weakest part of the system. When the children were likely to go to school until they were twenty-one, the first two or three years seemed of little account, and not much was attempted beyond the letters and to read in the primer.

In the mixed schools, and in most of the so-called primary schools, I find the little ones idle most of the time. They are called out to read in the morning and afternoon, and then left to themselves. I have found hundreds of children from eight to ten years of age who could not write.

There are a few young men on the committees who appreciate the importance of primary work and are anxious to make improvement, but they have serious difficulties to contend with. Chief among these is the scarcity of suitable teachers. The pay—from five to seven dollars a week—will not command trained teachers. The teachers are of two classes,—those

who have taught so long in the old way that it has become a second nature, and those who have recently graduated from the high school, and have only the recollection of their own primary school life to guide them.

Most of these teachers have never seen a good primary school. Nor can they see one easily. There is no fairly well equipped primary school below Sandwich, unless, possibly, one in Hyanis. There is scarcely one in which the spirit of the modern primary methods exists at all. There is no thoroughly equipped school below the one connected with the Normal School at Bridgewater, and that is nearly one hundred miles from Provincetown.

There are no counties in the State in which the teachers are so isolated as in Barnstable and the islands. There is no other in which there is not some city or large town, containing good schools, to which the country teachers can go for help.

The committee cannot teach these teachers. They are not themselves familiar with the details of the work, nor have they the time. The State might help these counties in two ways: first, by employing permanently a skilful and enthusiastic man, who could do for these teachers what the professional superintendents are doing in the cities; second, by maintaining at two points on the Cape, and one on the Vineyard, a model primary school, to which the teachers might resort to learn what good teaching is.

One such school at Harwich, another at Sandwich, and one at Cottage City or Vineyard Haven, would be powerful levers in raising the standard of elementary work throughout this part of the State.

TEACHERS.

Of the teachers whom I found at work, 30 per cent. had taught less than one term in the schools in which I saw them; 11 per cent. had taught less than one term in all; 19 per cent. had taught less than one year, and 42 per cent. less than three years.

Twelve per cent. were graduates of normal schools; 44 per cent. had attended only high schools or private schools; 29 per cent. had received only a common school education, and 14 per cent. were college students or graduates.

Persons sufficiently acquainted with schools to interpret these numbers will see that the waste which they imply is great. In the most favorable circumstances a change of teachers involves loss, but in schools wholly or partly ungraded, with no definite course of study, and with little or no internal supervision, the detriment is serious. When nearly one-third of the entire teaching force of two counties is new to the schools in which it is working, the outcome in scholarship and discipline must be unsatisfactory.

One result which inspection reveals is unevenness of work, resulting partly from frequent overlapping in the course of study and partly from the alternation of good and poor teaching. Teachers often find it impossible to learn just what the attainments of the pupils are. So, to be sure, they "begin back." Thus it happens that some parts of a subject have been under study several times, while other parts have been considered but once.

I have suggested to the committees that time would be saved by requiring each teacher to keep a record of the organization of his or her school, which should show the class place of each pupil for the term. At the end of the term an entry should be made showing how far each class has progressed during the term. If this were done, the work of each term would connect immediately with that of the preceding one, whether the same teacher or a new one were in charge.

It appears that more than two-fifths of the teachers have had less than three years' experience. In weighing these ratios it should be borne in mind that "experience" has its minimum value in localities where the opportunities for self-improvement are limited. Years of service may only result in confirming bad habits.

When a large majority have received no education beyond what their own towns furnish, have had no opportunities to see better schools, have received no help from local supervision beyond occasional criticism or suggestion, have attended, at most, one educational meeting in two or three years, and have read but little educational literature, the situation seems to me to be a grave one.

ABSENCE OF STANDARDS AND TESTS.

The best teachers fail to accomplish all that they might, because of the absence of definite standards of attainment. Few of the towns have any detailed course of study. The teachers do not know what should be expected of children who have been in school one year, or two years, or five years. Most of the committees have not gone as far as that in their own thought. So the teachers, having no definite point to reach, allow the school to drift. This is true in all the mixed schools, and in many of the semi-graded schools. Where no goal is set, the running lacks spirit. The brighter pupils do less than they might, and the dull ones do little or nothing.

One result of this is that teachers come unconsciously to gauge the success of their work by what the best scholars can do. Frequently teachers say to me: "I am sorry you came to-day, for my best reader, or my best writer, is absent." Both teachers and committees, having no absolute standard of attainment to which all are to be brought, satisfy themselves if one or two excel. From a pile of badly written copy-books they pick out the one or two good ones to show the visitor. If, in my examinations, one pupil writes a sentence or solves a problem correctly, while all the rest are faulty, the good one seems to atone for a score of bad ones, and both teacher and committee appear satisfied.

As there are no definite standards of work, so, in most of these schools, there are no tests of the work. Neither teachers nor committees bring themselves face to face with the facts as to the actual progress made in the schools. Lessons are assigned and recited day after day. Committees visit once or twice during the term and hear recitations. Sometimes they question the pupils, often not at all. In many schools there are no examinations, except the daily class recitations.

So it comes to pass that when an agent of the Board of Education appears, and submits some tests which reveal the facts, the teachers and committees are surprised and disappointed, and hasten to find reasons for the failure in the diffidence of the pupils, or the novelty of the exercise, or the absence of the best scholars, and are reluctant to admit that the real cause is the loose and aimless character of the work.

The country schools might be greatly benefited if the Board of Education would prepare for them a definite course of study, coming within their possibilities, and adapted both to the mixed and to the semi-graded schools.

If, in addition to this, some system of examination could be devised, and put in operation, similar in principle to the Regents' examination in New York, I believe the school authorities generally would welcome it as a help.

It has come to be an accepted principle that examinations have a powerful influence in determining the scope and spirit of the work done in any educational system. This being true, it would seem possible for the Board to shape the teaching in the schools to a much greater extent than it is now doing, and this without at all affecting the autonomy of the towns.

SUPERVISION.

Most of the evils to which I have alluded would cease to exist if there were adequate local supervision, skilled and constant. The defects in the present system have been repeatedly exposed in the reports of the agents of the Board. The work of the committees in Barnstable and Dukes counties is as good as anywhere in the State, but it falls far short of what the schools need, and it is not likely to be better. Several of the towns employ men at small salaries who give a part of their time to a general oversight of the schools. They are members of the school committee, but are called superintendents. They promote unity in the school work, and in other ways improve its character. The results of this kind of superintendence appear in Sandwich, whose schools, as a whole, seem to me to be the best in the county. They have been for some twelve years in the care of one man as superintendent, Charles Dillingham, Esq., under whose judicious management they have made substantial and steady progress. Falmouth has employed a professional superintendent for two years with gratifying results.

By a union of towns, three or four such men on the Cape and one on the Vineyard could do much to improve the schools of both counties. They should be young men, experienced teachers, who, by study and observation, have made themselves

familiar with the principles and methods of the best modern school work, especially the elementary work. They should be liberally paid, and heartily supported by the committees, whose agents they would be.

The experience of another year as your agent only serves to strengthen the opinion expressed in former reports, that only by the adoption of some such system can the deterioration of the country schools be checked.

Respectfully submitted,

GEO. H. MARTIN.

BRIDGEWATER, Jan. 1, 1886.

C.

REPORT OF JOHN T. PRINCE,

AGENT OF THE BOARD.

REPORT.

To the Board of Education :

The character of my work during the past year has not been essentially different from that of the previous year, which was given somewhat in detail in my last report. An inspection and examination of all or nearly all the schools of a town were followed by a half-day meeting for the teachers and school committee and, where it was desired, an evening meeting for the people. In my monthly reports to the Board I have given, among other items, an estimate of the character of teaching which I found in each of the schools visited. The estimate was given as very good, good, fair, poor or very poor. In the same way I gave an estimate of the condition of school buildings, including the ventilation, size, heating and lighting of the schoolrooms, furniture, apparatus, blackboards and out-buildings. By reducing these estimates to numbers and making an average of them, there is given a result, as shown in the following table, which indicates in a general way my idea of the average condition of the schools and schoolhouses in thirty-three towns located in Berkshire, Franklin, Worcester, and Middlesex counties. Thirteen other towns and cities were visited, but they are not included in the following list because a part only of the schools were inspected. Such an estimate is valueless, so far as comparison with other places is concerned, so different are the standards of different inspectors. It will also give little idea of the real condition of things unless the standard by which I made the estimate is known.

When absolutely no faults were observed in any particular, the object of inspection was marked "very good." When there were seen few faults, and those not of a serious nature,

the mark was "good." When the faults were more serious, and yet there was some merit observed, "fair" was given. The marks "poor" and "very poor" were given when the faults were serious and there were few or no redeeming points of excellence.

TABLE I.

TOWN.	Ventila- tion.	Size of Rooms.	Heating.	Lighting.	Furni- ture.	Appara- tus.	Black- boards.	Out- buildings.	Teaching.
A, . . .	61	60	72	72	74	56	67	70	65
B, . . .	55	73	68	75	69	45	70	75	60
C, . . .	38	80	57	58	68	50	60	52	60
D, . . .	44	66	50	62	60	51	60	55	60
E, . . .	65	75	80	67	77	40	71	66	60
F, . . .	48	80	44	45	75	53	70	50	55
G, . . .	55	74	55	75	80	45	64	82	50
H, . . .	31	74	40	67	60	42	45	40	42
I, . . .	30	68	36	76	58	48	54	60	54
J, . . .	40	62	46	66	68	48	47	60	51
K, . . .	36	65	61	65	67	50	58	64	53
L, . . .	24	68	52	54	56	40	68	40	56
M, . . .	29	67	44	69	64	43	49	48	51
N, . . .	38	80	40	76	68	44	74	60	53
O, . . .	37	70	47	70	60	45	55	57	50
P, . . .	28	65	40	50	57	54	45	50	57
Q, . . .	20	72	40	68	56	40	48	28	52
R, . . .	35	62	33	76	60	40	58	60	44
S, . . .	45	70	40	43	53	46	43	60	46
T, . . .	30	50	40	70	55	40	40	60	45
U, . . .	28	64	32	80	48	40	48	40	44
V, . . .	20	71	40	80	54	43	40	40	40
W, . . .	20	60	40	68	60	36	36	50	40
X, . . .	40	80	46	80	60	40	53	60	40
Y, . . .	36	93	40	90	80	46	63	65	60
Z, . . .	26	84	60	70	48	40	54	26	37
AA, . .	20	86	40	66	66	20	46	60	40
BB, . .	37	90	48	74	62	22	51	48	34
CC, . .	30	60	40	60	32	32	44	58	42
DD, . .	20	65	25	70	30	20	28	40	40
EE, . .	26	80	40	80	66	40	30	60	40
FF, . .	20	50	40	80	40	30	20	30	30
GG, . .	20	48	28	56	36	20	20	28	32

To show how the above averages were obtained, the following report in full of the town of A is given:—

Number of schools inspected, 10.

Number of schools examined, 6.

Number which were found very good, 1; good, 3; fair, 5; poor, 1; very poor, 0.

Number of schoolhouses inspected, 4 (11 rooms).

CONDITION AS FOLLOWS:

	Very Good.	Good.	Fair.	Poor.	Very Poor.
Ventilation,	-	7	-	2	2
Size of Room,	-	1	9	1	-
Heating,	-	7	4	-	-
Lighting,	-	8	2	1	-
Furniture,	-	8	3	-	-
Apparatus,	1	2	3	4	1
Blackboards,	-	5	5	1	-
Out-buildings,	1	1	1	1	-

“Very good” was marked 100; “good,” 80; “fair,” 60; “poor,” 40; “very poor,” 20; giving a result as indicated in the table.

VENTILATION.

A casual glance at the above table will show that the ventilation of the rooms inspected is far from what it should be. A better idea of the attention, or want of attention, given to this important matter in each town may be gathered from the following table where the number of rooms is indicated. It should be borne in mind that rooms were marked “poor” and “very poor,” in which little or no special means of ventilation were provided, and that “very good” and “good” were said only of those rooms in which there were means of carrying away the foul air.

TABLE II. — *Ventilation.*

TOWN.	Whole Number of Rooms Inspected.	Number Very Good and Good.	Number Fair.	Number Poor and Very Poor.	TOWN.	Whole Number of Rooms Inspected.	Number Very Good and Good.	Number Fair.	Number Poor and Very Poor.
A, . .	11	7	—	4	S, . .	6	—	1	5
B, . .	9	3	1	5	T, . .	4	—	1	3
C, . .	14	—	—	14	U, . .	5	—	—	5
D, . .	9	2	1	6	V, . .	7	—	—	7
E, . .	8	5	2	1	W, . .	5	—	—	5
F, . .	10	—	4	6	X, . .	3	—	—	3
G, . .	17	4	6	7	Y, . .	7	1	—	6
H, . .	7	—	—	7	Z, . .	10	—	1	9
I, . .	10	1	—	9	AA, . .	3	—	—	3
J, . .	9	2	1	6	BB, . .	7	2	—	5
K, . .	11	—	1	10	CC, . .	5	—	—	5
L, . .	5	—	—	5	DD, . .	4	—	—	4
M, . .	13	1	1	11	EE, . .	3	—	—	3
N, . .	12	—	—	12	FF, . .	2	—	—	2
O, . .	8	—	—	8	GG, . .	5	—	—	5
P, . .	13	3	2	8	Total,	256	31	24	201
Q, . .	5	—	—	5					
R, . .	9	—	2	7					

When we consider how necessary to good health is a proper supply of pure air, and how quickly the air of an unventilated schoolroom becomes poisonous, the neglect or indifference in regard to the health of school children, as shown in the above table, is worthy of serious attention. The importance of the subject would almost demand the enactment of a law which would require towns to provide properly ventilated schoolhouses, and which would forbid a school to be taught in a room which did not meet the approval of some competent person, authorized to inspect the schoolhouses with special reference to their sanitary condition.

APPARATUS.

Another column in the first table which presents low estimates is the one in which is indicated the character and extent of apparatus or means of teaching. Some rooms which I visited had absolutely no means of teaching not even an outline map or globe. Others — a larger number — had two or three

pieces of apparatus only, such as a globe and numeral frame. These rooms were marked "poor." The rooms which were considered fairly supplied with apparatus had, in addition to what has been mentioned, a few other things used for illustration, provided frequently by the teachers and pupils. I marked the apparatus of those rooms "good" and "very good," which had all, or nearly all, of the means of teaching and illustrating the various subjects required to be taught, and which were well supplied with means of keeping the little ones busily and profitably employed at their seats. With this explanation the following table may be of some interest in showing how well the schools which I visited are supplied with apparatus.

TABLE III. — *Apparatus.*

TOWN.	Whole Number of Rooms Inspected.	Number Very Good and Good.	Number Fair.	Number Poor and Very Poor.	TOWN.	Whole Number of Rooms Inspected.	Number Very Good and Good.	Number Fair.	Number Poor and Very Poor.
A, . . .	11	2	3	6	S, . . .	6	—	1	5
B, . . .	9	1	2	6	T, . . .	4	—	—	4
C, . . .	14	3	3	8	U, . . .	5	—	1	4
D, . . .	9	—	4	5	V, . . .	7	—	2	5
E, . . .	8	—	—	8	W, . . .	5	—	—	5
F, . . .	10	2	3	5	X, . . .	3	—	—	3
G, . . .	16	—	4	12	Y, . . .	7	—	2	5
H, . . .	7	—	1	6	Z, . . .	10	—	—	10
I, . . .	10	2	1	7	AA, . . .	3	—	—	3
J, . . .	9	—	4	5	BB, . . .	7	—	1	6
K, . . .	11	1	4	6	CC, . . .	5	—	—	5
L, . . .	5	—	1	4	DD, . . .	4	—	—	4
M, . . .	13	—	2	11	EE, . . .	3	—	—	3
N, . . .	12	1	1	10	FF, . . .	2	—	—	2
O, . . .	8	—	1	7	GG, . . .	5	—	—	5
P, . . .	13	1	3	9					
Q, . . .	5	—	—	5	Total,	255	13	45	197
R, . . .	9	—	1	8					

The duty of supplying apparatus for the schools belongs to the school committees; but the poorness of it, both in kind and amount, is not always their fault, as is shown by the following extract from a school report of one of the towns which I visited.

“One of the most urgent needs of your schools, in our view, is apparatus, maps, charts, etc., to aid in the instruction of the scholars, especially the younger members of the schools, who are able to comprehend but little of their text-books, but whose eyes are sharp and wits keen to learn quickly from a teacher who has the knack of giving practical illustration to the ideas she wishes to convey. We are allowed to use one-fourth of the annual income from the State fund for the purchase of such aids, but cannot do so from the fact that all the available appropriations are needed to run the schools long enough so the town may not be cut off from their share of the State's fund. Our farmers might as well furnish the men they employ with rusty hoes and dull scythes, expecting to receive full value for their outlay, as to look for first-class results with the use of ordinary text-books only, as aids to the teachers in their work.”

Really, however, the fault lies not directly with the people or committee. The law of supply and demand explains this, as it does some other questions. When there are, in the schools, teachers who see the importance of using apparatus in teaching, and who know how to use it, there will be little difficulty in obtaining what is needed. The people, as a rule, are not slow to see and to correct any waste of money when their attention is called to it, as it would be by teachers thoroughly qualified for their profession. Such teachers do not always depend upon a great outlay from the public treasury to provide needed apparatus, but make it themselves, or have their pupils make it, at small expense. The very best apparatus, especially for elementary science teaching, is often that which is made or collected by the children themselves. As a rule, it may be said, that a school which has been taught by a good teacher for any length of time is well supplied with the means of teaching, and that the putting of apparatus into the hands of poor teachers is of little use, because the necessity of using it is not appreciated, and the methods of teaching are not known by them.

TEACHING AND TEACHERS.

In considering my estimate (in Table I.) of teaching which I found in the schools, it should be remembered that the record there given is only of the country schools. It should also be understood that the standard by which I judged the work of teachers was very high. The “good” or “very good” teacher I regarded as one who has a well-defined purpose in all that he

attempts to do ; one who not only leads his pupils to acquire useful knowledge, but helps to cultivate in them those powers of mind which will enable them to do well whatever they are called upon to do. Applying this standard of measurement to the everyday work of the untrained and undirected teacher, we see very little teaching which can be called good. It cannot be so called, when pupils are allowed to read without thought or expression, to do problems in a thoughtless and mechanical way, and to memorize what they do not understand. It cannot be so called, when the recitation is conducted in such a way as to permit the pupils to do the least possible thinking and talking, and to give little or no attention to what others are reciting. It cannot be so called, when the teacher tells what the pupils should ascertain for themselves, and when pupils are forming habits of idleness by not having enough work, or by having the wrong kind of work to do. It cannot be so called, when the main object of the teacher is to keep "order," so called, and to hear some detached and disconnected facts which the pupils have learned from books. And yet some or all of these faults are seen in most of our country schools to-day. We congratulate ourselves upon the excellence and improved condition of our schools, and perhaps there is some cause of congratulation when we compare our schools with those of some other places, or with those of our own State fifty years ago ; but it is a fair question to consider whether the schools can be performing the greatest service, or can be improving to a great extent, as long as the teachers' preparation for their work is limited to the education which they get in the same schools they are called upon to teach, or even in poorly taught academies.

What I have said thus far applies mainly to the schools of small towns, or towns which have no superintendent of schools. The schools of our cities and large towns are in a far better condition in many ways. Their superiority is seen in the attainments of the pupils, in the habits of industry and application which are formed, and in those methods of teaching which aid in developing the active powers of the pupils and lead them to work in an orderly way. There are some natural advantages in education which the country boy or girl has over the city-bred child. How to retain these advantages, and at

the same time gain the advantages of better school training, is a question which we should carefully consider. Better teachers and better supervision are needed to make better the schools of these smaller towns. But there are serious difficulties in the way of getting either one or the other of these means of improvement. In the first place more than half of the towns which I have visited during the past year are unable to raise more money for schools without a somewhat burdensome tax. It is true that a want of proper care on the part of committees in selecting teachers sometimes places teachers in the schools who would not be found there if the selection was based upon merit alone ; but generally it may be said that better teachers cannot be obtained unless better salaries are paid. What kind of professional skill can be expected for five or six dollars a week, with the chance of working only six or seven months in the year? I am convinced from careful observation of the condition and needs of these smaller places, that assistance from the State, or elsewhere, must be had before great improvement can be made either in teaching or in supervision. The assistance which is already given by the State is most gratefully received, and in most cases wisely applied ; but it does not make up the loss which many sparsely settled towns have sustained in decreased valuation and population. The taxes in many places are greater than formerly, and although the number of pupils is less than it was, the number of schools often remains the same, owing to the former large extent of school districts. The relief which such towns need is that which can be given by the State without oppressing any one with a burdensome tax. Conditions of assistance could be so made that no lack of local interest and effort in behalf of the schools would be felt. Indeed, the assistance could be given in such a way as to increase rather than diminish the interest of the people in the schools, and thus lead them to raise money by local taxation more willingly than before. In what way may this assistance be best given? My own impression is that the funds which are given by the State should not be put into the treasury of the assisted towns unconditionally, for the general benefit of the schools. Such a course might make the towns feel that their obligation to raise money was made correspondingly less, and the consequence would be that the schools would not be im-

proved. There have come under my observation two or three instances of decreased appropriation for schools as a consequence of the increase of the State school-fund which was made last year. It would be far better, in my opinion, to give assistance in the direction of better supervision. If there were placed over these country schools persons qualified in every way to direct the education of children, there would be far better teachers employed than there are at present. The work of even the present class of teachers, who are generally intelligent and faithful, would be much more effective if it had the guidance and direction of a skilled superintendent. The services of such an agent could be gained by the plan of district supervision so long advocated by the present Secretary of the Board.

DUTIES OF SUPERINTENDENTS.

What I said in my last report, upon the duties of school superintendents, has called out the criticism that the functions there outlined are not in many cases performed, by reason of the fact that under the present law superintendents are, in all respects, "under the direction and control" of the school committee. The assertion is made that superintendents are not free to carry out their ideas and are not permitted to perform the duties which really belong to them. It is certainly true that there are some superintendents who are thus hampered, and the question is often raised whether the duties of these officials should not be more definitely fixed by law, or whether some of the duties now enjoined upon school committees should not be given to the superintendents. One superintendent informs me that he has little or nothing to do with the selection of teachers. Each member of the school committee has two or more schools under his special charge and takes upon himself the duty of selecting the teachers of these schools. In a majority of cases in that town the selection is made from the towns-people, with little reference to qualification. The time of another superintendent is almost wholly given to clerical and other work which could as well be done by a boy. These may be extreme cases, but they illustrate the possible dangers of our present system, which allows the work of a superintendent to be determined and directed solely by the school committee.

FREE TEXT BOOKS.

Although there is some opposition to the new text book law, particularly in country towns, it meets with very general favor throughout the State. Where the law is properly interpreted and enforced, as it is in most places, the books are ready for use on the first day of school — a state of things quite in contrast to the former condition of many schools during the first few days of every new term. In addition to economy of time there is economy of money. Many books which, if owned by the town, would be in use two or three years, are cast aside at the end of a year when they are owned by private individuals. A third advantage of the new law is seen in a better school attendance. In not a few of the manufacturing towns this advantage is felt very perceptibly. In one town the superintendent informed me that in the high school and in the higher classes of the grammar school there had been within a few months an increased attendance of at least ten per cent., and that he could attribute the increase to no other cause than to the free furnishing of text books and supplies. Another advantage of the law — perhaps a minor one — is the increased facilities which school committees have of providing needed charts, books of reference and supplementary reading. In the smaller towns especially, I have seen a change for the better in this respect — due somewhat perhaps to the closer contact in which committees are brought to publishers and supply agents.

I have found objection on the part of some committees to that part of the law which relates to supplies. In some cases the pupils were required, in opposition to the law, to get their own supplies, and in other places the free supply of pencils, paper, etc., was very meagre. On the whole, however, the entire law is very generally obeyed both in its letter and spirit.

OVER-PRESSURE.

The question of over-pressure in the schools has attracted not a little attention of late, and although it cannot be finally settled without a minute and extended inquiry into the causes of ill-health, it may not be amiss for me to give in a general way the results of my observation. In the country schools with

which I am acquainted, no signs of over-work are manifest. I do not remember a single instance of ill-health in the country which was supposed by anybody to be caused by over-work in school. Indeed, my observation has led me to believe that there is too little rather than too much work in many of these schools.

The danger of over-work, I believe, exists mainly, if not wholly, in graded schools, where large numbers are taught together, where there is greater competition than in ungraded schools, and where the work of each pupil cannot be so easily adjusted to his capacity and needs. And what are the facts in these schools? I am prepared to agree with a recent London School Board Report so far as to say that in some of our graded schools there are pupils who are over-worked. The number in any school is, I believe, small who are stimulated beyond their strength and the schools are few in which such extreme stimulation is encouraged. When, with a large class of children whose minds are naturally quick and active, the teacher resorts to the daily marking of recitations, to the giving of extra credits for extra work done, to ranking, and to holding up the danger of non-promotion before the pupils; and when, added to those extra inducements to work, there are given by committees and superintendents examinations for promotion at regular intervals, it would be very strange if there were not some pupils so weak and so susceptible as to be encouraged to work beyond their strength. There is another occasion of over-work which I have found in a few schools, and that is the spending of nearly all of the school time in recitation and putting off study to extra time at home. When a school of forty or more pupils belong to the same class, and are not separated into divisions for recitation and study, there is a temptation to spend the greater part of the time in recitation which few teachers can resist; and if tasks are given, they have to be learned out of school or not at all. Pupils of grammar schools are known to feel obliged to study two or three hours daily from this cause at a time when they should be sleeping, or exercising in the open air. Frequently, however, it is not so much over-work as over-worry that most affects the health of the child, — that worry which may not always be traced to any fault of system or teacher, but which, it must be admitted, is too often induced by encouraging wrong motives to study.

In making up the verdict we must not forget that others besides the teacher may be responsible for over-work and over-worry. The parents and pupils themselves are quite as often to blame as are the teachers. An unwillingness on the part of pupils to review work imperfectly done, and a desire on the part of parents to have their children get into a higher class, or to graduate, frequently cause pupils to cram for examinations and to work unduly at a time when the body is least able to bear the extra strain. Again, children are frequently required to take extra lessons in music or some other study at home, thus depriving them of needed exercise and recreation, or exhausting nervous energy which is needed for their regular school work.

It will be observed that in this charge against parents, I do not speak of those causes of ill-health which really have nothing to do with over-work, but which are oftentimes forgotten when a school boy or girl breaks down. I allude to the eating of improper and unwholesome food, to irregularity of eating and sleeping, to attendance upon parties and other places of amusement late at night, to smoking and to the indulgence of other habits which tend to unduly excite the nervous system. For very obvious reasons these causes of disease are not brought prominently forward by the attending physician, who doubtless thinks it safer and more flattering to his patrons to say that the child has broken down from hard study, rather than from excesses which are somewhat discreditable. While parents are clearly to blame for endangering health in the ways indicated, it may be a question whether the work required to be done in school should not be regulated accordingly; whether, in designating the studies to be taken, and in assigning lessons, there should not be taken into consideration all the circumstances of the pupil's life which can be conveniently ascertained, even though those circumstances are most unfavorable to school work and are brought about mainly through the ignorance or folly of parents. Of course there is a limit to such an adjustment of work in school, but with proper caution and a good understanding with the parents there need be little danger of advantage being taken by an indolent child; nor need the school be affected when it is understood to be a sign of weakness rather than of favor to any particular pupil to lessen his

work. Not unfrequently there are found other causes of ill-health than those which I have mentioned ; such, for instance, as poor ventilation, over-heating of the schoolroom, draughts of cold air and the like ; not to speak of the annual public exhibition, with the possible nervous excitement attending it. All of these things are mentioned, not because they belong directly to the question of over-work, but because it is well, in considering the question, to keep in mind all possible causes of ill-health, that no one cause may be unduly emphasized.

I cannot close this report without referring to the hearty co-operation of teachers and school officers in my work of inspection during the year. My criticisms and suggestions were in almost every place most gratefully received, and such a spirit was manifested as not only to make my visits pleasant, but to give assurance of the great interest which the people have in the public schools.

Respectfully submitted,

JOHN T. PRINCE.

JAN. 1, 1886.

D.

REPORT OF CHARLES M. CARTER,

AGENT FOR THE PROMOTION OF INDUSTRIAL DRAWING.

REPORT.

To the Board of Education :

In addition to my work in the Normal Art School, and in visiting towns and cities, I have during the past year given one address at each of the Normal schools, my aim being to harmonize the instruction of these schools, and, as far as possible, to give to all the work under direction of the State Board of Education the same general character. These special addresses were received with favor, and a general desire was expressed that others might follow.

It seems advisable to suggest that the advancement of drawing in the public schools might be promoted if some plan were devised by which the teachers of drawing in the Normal schools would work more in concert.

At the State Normal Art School marked advance has been made in preparing pupils to take charge of drawing in the public schools. In addition to attending special lectures on this subject pupils are required to give teaching exercises in all departments. Visits have been made to schools and exhibitions to see work in progress and in completion. Furthermore, pupils have been required to prepare sheets containing fifty or sixty illustrations suitable for teaching exercises. If it were possible to have students serve an apprenticeship in the actual teaching of children they would be much better fitted for their work. The changes which have been made in the course of study have resulted in a change of sentiment in regard to teaching exercises. When these were connected with but one department of the school they were looked upon with disfavor, but now the change has been so complete that students of the advanced classes return to Class H. to receive further instruction.

Attempts have been made to bring together the teachers trained at the Art School and other drawing teachers in the State. Only by doing this can the best results be obtained. Many towns within easy reach of Boston have been urged to secure for a day or two per week those who are still at the Art School. Such work would benefit the towns and enable pupils to prolong their studies.

Great improvements have taken place during the past few years in methods of teaching industrial drawing. Until recently drawing was regarded as simply copying the printed examples found in a set of drawing-books. Interest in objective methods of teaching has had its effect on drawing as well as on other studies. It was seen that the printed examples were the result of other people's observation; that pupils were copying them blindly, often with but little knowledge of underlying principles. The drawings represented many impossibilities. In perspective drawing, for instance, vanishing lines, etc., were made with little reference to their proper relation; but now all this is changed where drawing is properly presented. The whole subject is now regarded as based on the study of *Form*. The manner in which this has been developed, in connection with my State work, is illustrated in the accompanying Outline of an Eight Years' Course of Instruction. It has been found best to arrange the work under three heads: 1st. *Observation*, including all that pertains to knowledge of form. 2d. *Expression*. 3d. *Invention or Design*, including all new arrangement of form.

The first of these divisions is of the greatest importance, for without a clear understanding of the forms presented, work of the second and third divisions would be imperfect. It is supposed that a skilful teacher is capable of presenting any object of thought so that it may be understood. If teachers can lead pupils to gain clear ideas of form, they are likely to become skilful teachers of drawing, even though they have little training of hand or eye. Pupils, by repeated attempts in expressing a well understood idea of form, will become skilful in the use of hand and eye; but no amount of manual skill on the part of the teacher will compensate for lack of power to present the idea to be expressed. Expression of thought exercises hand and eye by three means, varying in order and used

singly or combined: they are *Construction* (making forms), *Drawing and Language*.

Construction is first employed in the primary school as a means of expressing a knowledge of objects as wholes. When the parts of those objects are represented, drawing is the means of expression. Language is the poorest means of expression in this connection, but may often be combined advantageously with drawing or construction.

Thus taught, pupils find it as easy to represent the square face of a cube as to copy the printed square of the book. Flat copying is not given up entirely, but most exercises are from objects.

The first exercises in construction require pupils to make from working drawings, out of paper or card board, simple forms like the cube, triangular prism, etc. Other exercises make use of thin wood in making from drawings models of useful objects, such as a match-box, footstool, scholars' companion, etc. Other materials may be introduced when practicable. Some of these exercises are, of course, particularly adapted to boys, but many of them have been done by girls. All constructed work is voluntary and done at home, with the exception of some simple objects made of paper. The drawings are made in school as a class exercise, except where pupils ambitiously attempt more difficult objects than those proposed by the teacher. As far as this method has been developed teachers have only been asked to be responsible for the drawings. The tendency of this work must be obvious. Especially is it suggestive of an easy method of introducing manual exercises, making them an outgrowth of the industrial drawing. Children ever desirous of making or constructing have their efforts directed in an educational channel. The three means of expression, — construction, drawing and language, — offer an excellent mental training, aside from increased skilfulness in the use of hands and eyes. For neither of these means will give accurate results unless it is the result of *systematic thought*. To make, draw or describe, necessitates a certain orderly procedure resulting from an orderly habit of thought, good judgment, ideas of right and wrong, etc., qualities which cannot be too highly valued as elements of a successful life. We have not space to more than hint at the important outgrowth which may be expected from this new

departure. Although it has not been completely developed, it has been welcomed by many educators as a valuable means of incorporating ideas of manual training with public school work.

All that relates to new arrangements of form is put under the heading, *Invention or Design*, expression being through construction, drawing and language. This department is arranged in the belief that some *principle*, — as symmetry, proportion, etc., — must lie at the basis of each exercise, and that each demands *materials for suggestion*. The subject thus taught is in harmony with the way the subject is practically approached by professional designers. As an output of this work, pupils may be led to apply this knowledge both to construction and ornamentation. Thus, a design has been made to fill a certain space. The motive has been taken from plant form. Transferring the design to some material it may be worked out as the ornamentation of a lamp mat, a pin cushion, or a tidy. This has often induced girls to make their first attempt at needlework. Where sewing is taught, drawing should be used as a means of accurately planning the work.

The peculiar exercises of this department, and the incidental study of plant form and historic ornament are important as being the basis of many exercises which will cultivate the taste. Discussions of the elements of beauty, as observed in the pupils' surroundings at home and at school, have given rise to illustrated written exercises, in which pupils have discussed "Beauty in common objects."

All such exercises tend to cultivate discrimination in matters of taste, increased interest in one's surroundings, and to develop lasting ideas of the good, true and beautiful.

A large exhibition, showing the result of the method described, was held last June in Quincy. Unlike industrial exhibits previously held, every object was accompanied by the drawing from which it was made. This logical and educational way of making object work the outgrowth of industrial drawing attracted considerable attention when shown in Quincy, and afterwards in connection with the National Educational Association at Saratoga, and subsequently at the meeting of the Massachusetts Teachers' Association.

The annexed plan will show to teachers the prominent features of each year's work and show how to combine the manual exercises. Towns that have introduced drawing have already taken a step in the direction of industrial training. An easy way of taking another step is suggested. Let all teachers attempt something in this direction. Under skilful direction the enthusiasm sure to be awakened will lead to desirable results.

Respectfully submitted,

CHAS. M. CARTER.

JAN. 30, 1886.

INDUSTRIAL DRAWING.

OUTLINE OF AN EIGHT YEARS' COURSE OF INSTRUCTION FOR
PRIMARY AND GRAMMAR SCHOOLS, USED AT THE MASSA-
CHUSETTS NORMAL ART SCHOOL, AND IN STATE WORK
UNDER DIRECTION OF THE STATE BOARD OF EDUCATION.

NOTES.

Industrial Drawing as herein presented is regarded by many educators as *the foundation of industrial training*.

It gives skill in the use of hand and eye, good habits of thought, and appreciation of the beautiful.

Drawing and designing are here combined with the *construction* of objects.

Where workshop instruction is introduced the drawings and constructed work may be of practical examples referring to courses in manual training. This plan shows how the natural tendency of children to occupy themselves in making objects at home, can be made fruitful by intelligent direction.

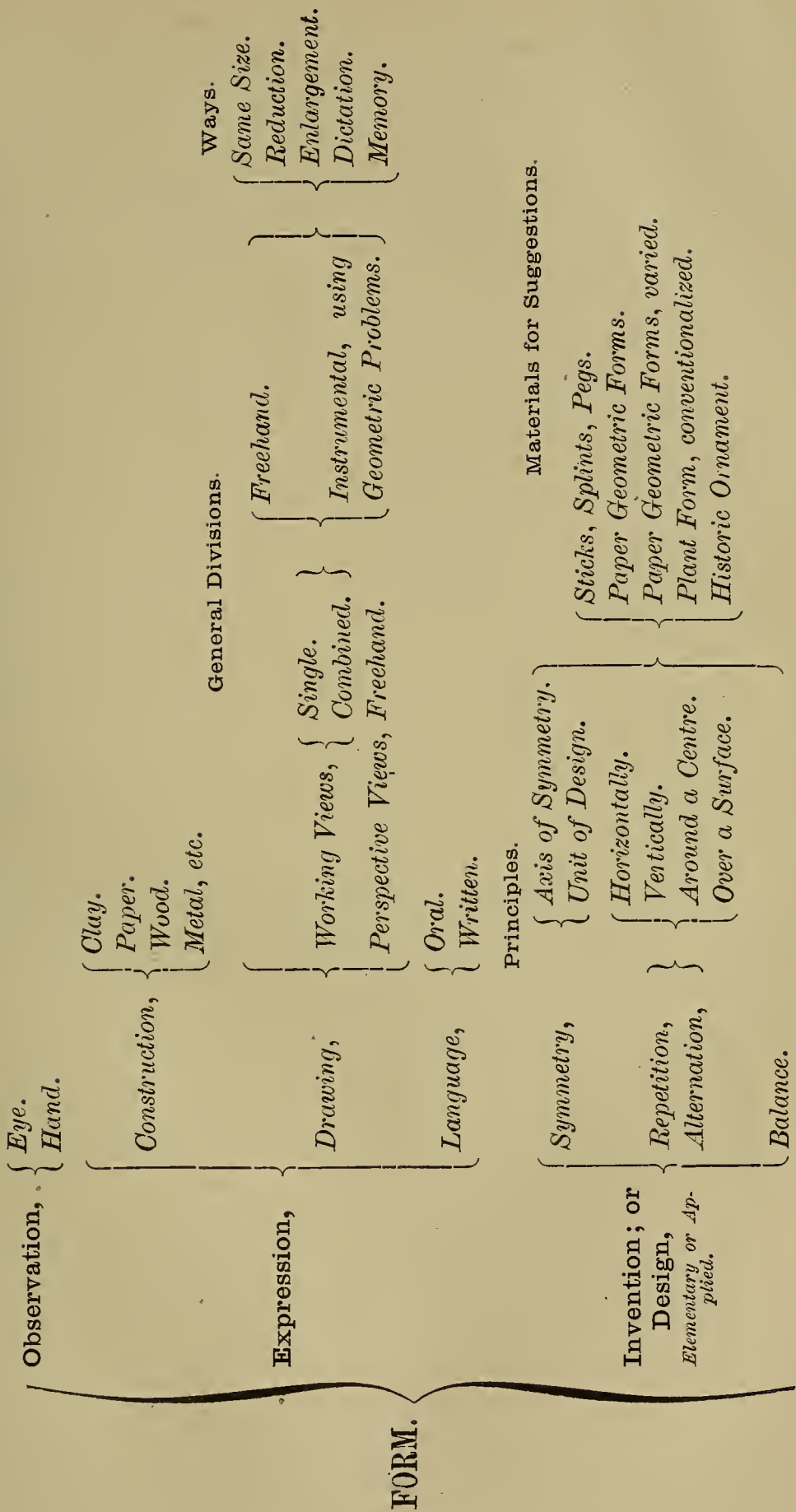
The plan is arranged so that it may be incorporated with courses of study prepared by school committees.

It may be used either with or without text-books. Using it as a basis teachers can determine whether to omit, or add to the exercises of the book.

All work may refer to the following or their combinations : —

1. WORKING DRAWINGS.
2. PERSPECTIVE DRAWINGS.
3. INVENTION OR DESIGN.
4. CONSTRUCTED OBJECTS.

GENERAL OUTLINE OF METHOD.



OUTLINE OF EACH YEAR.

Ideas of form come from *Observation*, they lead to *Expression*, and may be combined into new forms by *Invention or Design*.

FIRST YEAR.

Ten minutes daily; using slates and blackboard.

Observation of the forms of objects in each year, by eye and hand.

EXPRESSION,

Employing Construction, Drawing, and Language.

General Form of Objects. Sphere, Cube, Cylinder, Square, Prism, Triangular Prism. Teach objectively as wholes. *Construct* each of clay. Observation and expression further developed by moulding simple objects based on them; as an orange, dice, stick of candy, etc. From the objects first used teach the *common qualities* of form, viz.: **Surface**, *plane* and *curved*; **Line**, and **Point**.

Commence teaching and representing the details of these qualities from models and objects.

I. **Points:** *Position*, — Centre, Above, Below, Right, Left.

II. **Lines:** *Direction*, — Straight, Curved; *Position*, — Vertical, Horizontal, Oblique; *Relation*, — Parallel, Perpendicular, Inclined; *Color*, — Light, Dark. Dividing into halves and fourths.

III. **Angles:** Right, Acute, Obtuse.

Objects and figures containing the above should be drawn.

INVENTION.

Optional. If taught, to be similar to that of the second primary year.

SECOND YEAR.

Fifteen minutes daily; using slates, paper, and blackboard.

Review work of the first primary year, including moulding.

EXPRESSION,

Employing Construction, Drawing, and Language.

From the following models: Triangular Prism, Square Prism, Pyramids, etc., teach: —

IV. Triangle: Right-Angled, Isosceles, Equilateral.

V. Square: Diagonals, Diameters.

VI. Oblong.

Judging, Measuring, Dividing, and Ruling Distances.

Draw Single Freehand Working Views of models, objects, and ornament illustrating the above plane figures. *Construct* them of clay, paper, wood, etc.

Substitute paper for the slate during the last half of the year.

INVENTION.

Principles. Symmetry, Repetition, and Alternation.

Materials. Sticks, colored paper, Triangles, Squares, etc.

Teach pupils to arrange the materials so as to express the principles. Subsequently replace the materials by lines. Tracing around units allowed.

The materials may also be used to represent various objects, as house, ship, etc. Teach the names of colors represented by the sticks and papers, and cultivate a taste for beautiful combinations.

Combine at times, in the same lesson, form, drawing, invention, color, arithmetic, language, etc.

THIRD YEAR.

Thirty minutes three times a week; using paper and blackboard.

The first exercises review the work of previous grades, in order that special attention may be given to the proper use of paper and pencil.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach: —

VII. Circle: Semi-circle, Quadrant, Circumference, Diameter, Radius.

VIII. Ellipse: Long Diameter, Short Diameter, Foci.

IX. Oval.

Draw Single Freehand Working Views of models, objects, and ornament illustrating the above plane figures. *Construct* them from drawings, using wood, paper, etc. Compare the beauty of curvature illustrated by different forms.

INVENTION AND DESIGN.

Principles. Symmetry, Repetition and Alternation.

Materials. Colored Paper geometric forms both simple and varied.

When pupils create the variations of units the arrangements are called designs.

Ruling allowed. In all grades teachers should be familiar with the principles of growth, contrast, repose, etc.

FOURTH YEAR.

Thirty minutes three times a week; using paper and blackboard.

Review the Circle, Ellipse and Oval.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach: —

- X. Compound Curves. Reversed Curves.
- XI. Hexagon.
- XII. Pentagon.
- XIII. Octagon.
- XIV. Spiral.

Draw **Single Freehand Working Views** of models, objects, and ornament illustrating the above plane figures. *Construct* the plane figures, and objects based on them, of paper, wood, etc.

DESIGN.

Principles. Symmetry, Repetition, and Alternation.

Materials. Conventionalized Leaves, Flowers, and Buds.

Ruling allowed.

In all work strive for beauty of form.

FIFTH YEAR.

Thirty minutes three times a week; using paper and blackboard.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach and draw: —

Freehand Working Views, single and combined, illustrating Plans and Elevations. *Construct* the models of paper, first making simple *developments*. These models will be useful in teaching Freehand Perspective.

Perspective Views, Freehand. The effects of foreshortening and distance explained in connection with drawing spherical objects, circles, cones, cylinders and objects based on them. Explain that in a *Working View* the eye is supposed to be opposite each part of the

view represented. In *Perspective Drawing* the eye remains in one position.

DESIGN.

Principles. Symmetry, Repetition, and Alternation.

Making arrangements on given main lines introduced.

Materials. Conventionalized Plant Form. Use ruler and tracing paper.

Designs may be *applied* to objects, as pen-wipers, book-marks, etc., *constructed* by pupils. In this and the following years have pupils take "main lines" from good examples and clothe them with different material. Cultivate taste by comparing examples of good and bad design.

SIXTH YEAR.

Thirty minutes three times a week; using paper and blackboard.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach and draw : —

Working Views, *Freehand and Instrumental*, single and combined. Two views given to find a third. Marking dimensions. Simple sections. *Construct* simple objects from Working Views, especially models useful in Freehand Perspective.

Geometric Problems, and their applications.

Perspective Views, *Freehand*. The convergence of parallel lines. Drawings made from the cube, oblong block, etc., and objects based on them.

DESIGN.

Principles. Symmetry, Repetition, and Alternation.

Materials. Conventionalized Plant Form.

Use Rulers, Compasses, Tracing Paper, and Geometric Problems. Make more elaborate bisymmetrical arrangements, with and without outlines. Exercises may be planned in which designs are applied to objects constructed by pupils. *Historic Ornament or Naturalistic Views of Plant Form*, occasionally. Use them as a means of cultivating taste.

SEVENTH YEAR.

Thirty minutes three times a week; using paper and blackboard.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach and draw : —

Working Views. *Freehand and Instrumental*, single and combined. Marking dimensions. Advanced developments. Simple intersections. From measurement make full sized, and scale drawings; also encourage home *construction* from drawings of such objects as Lamp Shades, Picture Frames, Footstools, etc.

Geometric Problems completed.

Perspective Views, *Freehand*. *General Review.* Prisms, Pyramids, Plinths and objects based on them; Groups, Tinting.

DESIGN.

Principles. Symmetry, Repetition, Alternation, and Balance.

Materials. Conventionalized Plant Form and Details of Historic Ornament.

Use Instruments, Tracing Paper, and Geometric Problems. Designs may be applied to objects constructed by children, such as Lamp Mats, Pin Cushions, Match Boxes, etc.

Historic Ornament or Naturalistic Views of Plant Form, occasionally.

In all exercises cultivate appreciation of the beautiful.

EIGHTH YEAR.

Thirty minutes three times a week; using paper.

EXPRESSION,

Employing Construction, Drawing, and Language.

From Models and Objects teach and draw: —

Working Drawings. *Freehand and Instrumental.* Instrumental work to employ the T Square, Scale, Triangles, and Drawing Board. Practical illustrations of drawing applied in industrial pursuits, Sections, Intersections, and Developments. Continue to encourage home *construction* from drawings of useful objects; such as Boxes, Bird Houses, Tool Boxes, Brackets, Trays, etc.

Perspective Views, *Freehand*. Frames, Crosses, and objects based on them. Leaning objects, Groups, Tinting.

DESIGN, Optional.

Principles previously studied combined with those of Applied Design.

Materials. Conventionalized Plant Form, Historic Ornament, Nature.

Design Wall Paper, Inkstand, Paper Weight, Hinge, etc. Occasionally have objects designed that may be constructed by needlework, etc. *Miscellaneous ornament* illustrating the highest forms of beauty.

Use Drawing freely each year in illustrating other studies.

E.

SCHOOL SUPERVISION.

BY

ALBERT P. MARBLE,

SUPERINTENDENT OF SCHOOLS, WORCESTER, MASS.

COMPLETE AND COMPETENT SCHOOL SUPERVISION.

The subject of the present discussion is a broad one; and a proper understanding of what may be said requires that every one who gives attention to it should himself make certain modifications in his own mind, to adapt it to his own locality and circumstances. . . . The astronomer discovers a new asteroid and locates it by its latitude and longitude, or its right ascension and declination; and his discovery is announced to the world. If, now, another astronomer wishes to observe the asteroid, on another continent, at another season of the year, at a different hour, in a different latitude, he must know how to make just the proper allowance for the change in the earth's position, for the variation in latitude, for the motion of the asteroid, for the rotation of the earth about its axis, and even for the observation of light, before he can point his telescope to the exact spot where the heavenly body is to be seen. In like manner certain observations will be made concerning school supervision in the latitude and longitude of Worcester. These observations taken literally may not all apply to the longitude of Boston or Pittsfield; perhaps not exactly to Milford or Fitchburg; but with the proper modifications which the judicious hearer will make, they may be profitable in any place not too remote.

Education is something by far more comprehensive than schools. It is acquired not alone in schools; they aim at education, but they do not secure the whole of education, only a part of it. The school is a means to this end. And there are schools and schools.

President Garfield is reported to have said that the very best kind of a college is a log with a boy on one end and Mark Hopkins for his teacher at the other end; that is, the best

possible training for a boy is intimate association with a thoroughly trained and well-rounded man. And President Eliot has said that a good school consists simply of a first-rate teacher. There is no doubt, I think, that the best possible training for a child is the constant daily association with a mature and highly cultivated man or woman, who should direct his studies, stimulate his curiosity and interest, and then point out the means for satisfying this awakened interest; and who should also direct the child's intercourse with other children without their knowing it. Such a training, by one fully competent, and knowing also the value of self-reliance and self-help, is perhaps the most complete kind of a school. It involves its own superintendency. The trouble about furnishing that kind of school is, that, numerous as are the candidates for the position of teacher, there are not enough to supply the country; as a rule they do not approach the requisite standard; and they couldn't be paid! Think of it: a thoroughly trained teacher for each child! The nearest practicable approach to this ideally best kind of school is one in which three or four dozen children together are in charge of such a teacher for a long series of years, or until they are capable of entering upon a course of independent study.

A school of this kind being independent, and having no relation to other schools, would need no supervision. Here also it is impossible to find teachers enough, or, if found, to support them, who are capable of conducting a class of children from the beginning to the end of even the limited public school curriculum. Think of that: a high-school master or at least a grammar-school principal in charge of every individual school-room in the town! It would cost too much; and even if we had them, none but the men would, as a rule, be permanent.

Even such an ideal school as this would not cover the whole field of education. There is another and a most important factor, always present, and always to be taken account of, namely: The parental discipline and control. It is the ignoring of this essential factor which furnishes the excuse for certain enthusiastic and ill-advised reformers to criticise the public schools, because the children are said to be lacking in a kind of training which it is the duty of parents to provide, and which our present common schools do not and should not

undertake. I refer to teaching trades, and to all that deftness which has, through long ages, been acquired by the race, and which must be handed down from father to son and from mother to daughter. How to keep house and how to do the chores are learned unconsciously at home as we learned to walk. The same is true of a wide field of knowledge of common things. Moral instruction also comes largely in this way. Every teacher may be vastly superior to the average parent in many of these little knacks; and the teacher may make himself useful, incidentally, in all these directions, in supplementing the work of the home. Morally, also, he may occupy a higher plane than some parents. He cannot, however, with profit and success, assume all the teaching here referred to, for he has not complete control of the children. And however much good he may do, that will be a sorry day for the pupil when he learns to distrust his parents, unless he has become capable of self-direction. Defective as the parental discipline may be in some unfortunate cases, it is probably better than leaving children to themselves; and we assume, as teachers, a grave responsibility when we undertake to relieve parents of the burden of training their children in the important particulars herein alluded to,—a responsibility which God and nature have placed upon them. Teachers should seek to co-operate with parents. They should be careful to do nothing to diminish the child's respect for his parents.

I.

But the ideal schools referred to above are not possible, both because the right kind of teachers cannot be found in sufficient numbers, and because not enough money could be appropriated to pay them, if found. A few children, as in an aristocracy, might be educated in that way. Something like it has been the custom in the great schools of England, where the aristocracy has been educated. For the mass of children in a democracy, a different scheme must prevail; and the best attainable education for all is undoubtedly better than the best education for the few.

It is this attempt to provide a good education for all the children of a community, and the impossibility of providing for

all the ideally best, which necessitates school supervision. A town may be able to find good teachers and pay for them, and one best teacher to supervise the rest, when the town would not be able to furnish one of the best teachers for every school, — a teacher profoundly educated in all branches of study, acquainted with the best modes of instruction, and familiar with men and affairs. Moreover, in the conduct of schools in the cities and largest towns, it has been found by experience to be most profitable to grade them. The schools then become mutually related, so that one must supplement another. Even in the smaller towns a more advanced school, a High School, is required, both by law and by the necessities of the case, to which all the others are tributary. The necessity for supervision then arises from the relation of schools to one another; and also, especially in the smaller towns, from the possibility of employing at least one superior teacher who may greatly improve all the others.

This necessity, under the conditions in which we find ourselves, may be illustrated thus: a competent shoemaker without assistance will make a first-rate boot. Population has increased so that too large a proportion of shoemakers would be needed to make the boots singly and by hand. They have to be made wholesale, and in factories. It is found to be far more economical to divide the labor and leave a single part of the process to be done by one set of men, and another part by a different set of men. By this means a good product is secured at far less cost. The highest skill for the entire process is not required in each individual workman; and the highest skill is secured in each individual part of the partial process. In such a factory supervision is required in each department, and a general superintendence of the whole becomes a necessity. As another illustration: an eminent artist, unaided and alone, may paint a picture. But the pictures of a great master cost thousands of dollars. We cannot all afford such pictures, and there are not artists enough to paint us each one. So we put up with engravings and chromos. It is better to have good chromos or engravings than to have poor paintings — mere daubs — or no pictures. The wholesale manufacture of engravings and chromos necessitates supervision. There is something analogous to this in a system of public schools; but, as in all para-

bles, the analogy is not complete, and neither of these illustrations should be pressed too far. Unlike the work of the artizan and the artist, the training of the mind is a spiritual thing, and not to be measured by any set rules or computed by weight or size. And the best product is to be spiritually discerned.

II.

In a general way school supervision consists in a controlling authority able to discern and to secure this spiritual product; the development, that is, of the highest type of manliness and womanliness attainable under existing conditions, in all the children of the town. It includes, then, the selection and appointment of teachers, the classification and organization of schools, determining the course of study, directing as to methods of teaching and discipline, and judging of the results. Incidentally, also, this supervision includes attention to the material part, the houses, furniture, apparatus, books, etc., and to the finances; for a wise economy of means is a part of all good or great achievements.

The nature of school superintendence naturally divides itself into two, and perhaps three, heads:—1st. In the smaller towns, with one or two dozen schools, each in a different neighborhood, and taught by one teacher, with sometimes a central school of higher rank. 2d. In the larger towns and smaller cities, with large graded schools, having each a principal; and 3d, perhaps, in the great cities, where a still more remote directive authority becomes necessary.

1st. It is commonly supposed that city schools furnish advantages vastly superior to those of the country. In some respects, no doubt, they do. They are generally kept for a longer term; they generally are better provided with houses, books, and apparatus; their teachers are more permanent and better paid—which means that many of the best go to the cities; in them the course of study is usually more comprehensive, and the standard of scholarship, as tested by mere knowledge, is generally higher. On the other hand, in the country, the boy or girl goes to school as a relief from home duties; he has more leisure to think, and less excitement to distract his attention; he is in intimate contact with nature

and real things ; he finds it necessary in school to rely more upon himself, and to stand as an individual, and not merely as one in a class — he is a mediæval warrior, and not a mere unit of a modern army ; though often, perhaps, traversing less ground in the school curriculum, he comes to his study with a freshness and an appetite which the city boy may have lost from too much school ; and what he studies, if only he has good instruction, he is more likely to reflect upon and to digest, than if he were surrounded by the thousand-and-one diversions of a city. . . . And yet, whatever comparisons may be made between city schools and country schools, the differences are unavoidable, and inherent in the conditions of each. Paved streets are necessary in the city, and they are never so muddy as a country road in spring ; but they are hard and noisy ; they destroy wheels and horses' hoofs. Which ever you prefer, the fact remains that we must pave city streets ; and we shall not pave the country roads. Equally inevitable are the differences between city schools and country schools. Each should, so far as possible, however, adopt the excellences of the other ; the city school by bringing into the schoolroom natural objects, and, in a thousand ways, the freshness of the country ; and the country, by adopting those improvements which have been devised in the best city schools. I prefer to speed my horse on a country road, provided it is smooth ; and I prefer to educate my child in a country school, provided it is as good as it may be.

The supervision needed in the country towns is concerned, first of all, as elsewhere, in selecting the best teachers, and in making them as permanent as possible. Time was when each district of a town had its prudential committee or agent, and each agent had his sister, or cousin, or aunt, who would teach the school till the revolution of the seasons and of the political wheel brought in another agent. Competent supervision by the town, even the smallest town, gradually introduces a corps of teachers trained more or less thoroughly, and then retains them for a succession of terms. In case there are not more than five or six months of school in each district, one competent teacher might teach alternate terms in two districts. In these schools good supervision vastly improves the classification of pupils. The great bane of ungraded schools, — that is, schools

with pupils of all ages and every variety of attainments, — is a multiplicity of classes. The fact is, in no good school do all pupils stand alike for a term, however well they may have been classified at first. The only way to keep them all together is to create a sort of bed of Procrustes, stretching some and chopping off others, to the injury or the ruin of all. In the ungraded school the classification is only a little less complete than in the graded. No great harm will happen if the classification is made less complete, and the number of classes fewer.

In St. Louis there used to be, I believe, sixteen or eighteen grades, and promotions every six months. In Boston there are eight or nine grades, and promotions yearly; the same work, substantially, being done in both cities in the same number of years. Quite likely the schools of Worcester might be arranged in five grades, with promotions once in two years, without absolute ruin; and the schools of Ruralville may have only three or four classes, and still do excellent work.

Rural supervision, again, secures in all the schools of the town a better method of teaching, uniform in all the schools, carrying to each the excellences of all the others, and, if complete and competent, suggesting the best to all. And finally, — for space will not permit me to enter more into detail, — all the district schools may be made to produce a degree of training so similar in character and degree, that the town High School may equal the best, instead of expending its energy in preparatory work and thus destroying half its usefulness.

As it is, a bright country boy or girl, with nothing but the district-school training, on entering the city schools at the age of twelve or fourteen will usually, in a year or two, outstrip the average pupil of his own age in those schools.

Given a complete and competent supervision of those schools, and they furnish the best opportunity for good children of ordinary ability. Taking all elements into the account, — the bad, the dull, and the lazy, — I am not so sure that the average would be so high in these schools as in the closely graded city schools.

To be complete this supervision should secure weekly visits and conference with the teacher. It ought to be sufficiently minute to make the acquaintance of every pupil individually, and to note his progress from week to week. The spur to the

teacher and the stimulus to the pupil's ambition from such outside inspection, and suggestion, and commendation, quickly appears in improved work and delighted interest.

2d. In the larger towns and the smaller cities the work of supervision includes all this and more. In such places, besides the selection and appointment of teachers, fixing the course of studies, organizing the schools, etc., there is the work of frequent promotions from grade to grade, the constant introduction of inconstant pupils, and new pupils, the crowding of schools here and the thinning of them there, incident to a restless and growing population, and the everlasting, though not always successful, endeavor to keep within the appropriations, and to provide new schoolhouses and new books and apparatus when and where needed. Here, also, it becomes of vital importance that the public be kept informed concerning the workings of the school system, and that their interest in the schools should be intelligent as well as warm; for nothing appeals more strongly to the hearts of the people than the welfare of their children. Such supervision, in a city of moderate size, cannot be exercised individually by any one or two men. Including, as it does, a personal knowledge of the progress of all the pupils, individually, beyond the acquaintance of the teacher, it must be done largely by the principals of schools. And here the work becomes of two sorts: first, professional; and second, general.

(a) Selection of teachers, appointing them to schools (for not all teachers equally competent are equally fitted for a particular school), fixing the course of studies, examining and promoting pupils, adopting new text-books, — all this is professional; and it should be in the hands, chiefly, of those who make a business of education, or who have special fitness for directing the internal affairs of schools.

(b) Building and caring for schoolhouses; supplying fuel, ventilation and light; the finances, including salaries; public sentiment respecting the schools; keeping *en rapport* with the public, for you can go no faster than the people follow, — they are the fountain, far above which the stream cannot permanently rise, — all this is general.

In the details of the professional part of supervision, the principal of a school has a personal knowledge of the individual

pupil's progress by seeing him every week. He promotes the pupil to a higher class whenever the interest of the pupil and of the class demands it; or he demotes him for the same reason. He observes and reports the work or the neglect of the assistant teachers; attends to the discipline of the school; and, in short, he is concerned that the education of a child, in passing along through his school, in the several grades and under numerous teachers, is one consistent whole, and not a series of hitches or jumps from grade to grade. He watches not only the progress in study, but the more important development of character and the acquisition of moral power; that is, the real education of the child. He superintends the examination of classes. He reports the absence of truants, and exerts his influence to prevent truancy; he settles cases of discipline referred to him by teachers; and he meets parents to hear their complaints, and to confer with them about the progress of their children. He has the care of the schoolhouse, sees that the janitor attends to his duty, and reports the necessity for repairs to house or furniture. So much for the details of work in an individual school. For the general system, in the whole city, another agency is required, whose work consists in examining and appointing teachers, and examining their work in school, and their execution of such rules as may be made for their guidance, both directly and through the agency of principals as shown above; who distributes the pupils among the several schools, and listens to appeals of teachers or pupils in cases of discipline, or promotion in grade and the reverse; who watches the working of the school system, introduces new methods of teaching or new subjects of study, and fixes the relative time and attention to be devoted to them; who directs the work of special teachers, as of music, or drawing, or writing; who strives to keep watch of educational progress and adopt improvements; who equally watches and wards off educational charlatanism,—a work of greater difficulty; in short, who seeks to adapt education to the time and place.

3d. A metropolitan system differs but little from that in the smaller cities, except that it covers a wider field, and employs more subordinate agencies in its supervision. The district of a Boston principal is larger than an ordinary town; and the

whole city is assigned to half a dozen supervisors, each of whose fields is as great as an ordinary city.

Such, in general, is school supervision. To point out in detail all that it includes, is as impossible as to tell what it is to keep a good school or to carry on a large factory; to conduct a retail store, or to manage a large army. Success in the work requires ability to see and do what needs to be done. No two places are alike; and no two years in the same place bring up the same questions for decision and action.

III.

The entire control of public schools has been placed by law in the hands of the school committee. This body always consists of three, or some multiple of three, members elected for a term of three years; one-third of whom are elected annually. It is thus a conservative body, since its complexion can not be changed in less than two years. It is a representative body in this State, elected by the people. Within its sphere it has an authority as absolute as any, under the laws. Its members are personally liable if they do not provide schools at the expense of the city or town, to the extent required by law, even if the town refuses to make the necessary appropriations; and the town is liable for the expense. They may hire rooms for the schools, if the town refuses to provide them; and they are the judges of the necessity for more school accommodations. They elect and fix the salaries of the teachers; they may for cause expel a pupil from school, or compel the attendance of a pupil by the aid of truant officers whom they elect. They may choose a superintendent who acts under their authority and whose salary they also fix. The whole corps of teachers, then, and the superintendent, are both under the authority of the school committee and are paid by them. In the State of Rhode Island, the teachers and the superintendent are elected and controlled, in a city, by the school committee, and paid by the city council. They must then serve two masters; one of whom may cut off their heads, and the other may starve them. It has been said that one cannot serve two masters—God and Mammon.

School supervision, then, is with us vested in the school

committee. Their authority, in a growing number of instances, is in part delegated to a superintendent, and to the principal teachers indirectly, as outlined above. The chief part so delegated is professional, and relates to the internal conduct of the schools. The general supervision, — that which relates to the schoolhouses, the finances, the public, etc., — and some portion, greater or less, of the professional part, is usually exercised by sub-committees. The ordinary school committee is usually composed of men and women each one of whom is best fitted for a particular part of the work; and quite generally, I think, they organize themselves so that each can do the work for which he is best fitted. One, for example, is well calculated to look after the schoolhouse; another, to care for the finances; another, to examine schools and teachers, and so on. I have heard of Normal Schools in which the embryonic teachers were given to understand that the average school committee is to be tolerated as a necessary evil, — probably not familiar with the best methods of teaching, and inclined to obstruct progress. I have not found it so in my experience. And if it be so in any case, the fact remains that the committee should be presumed to fairly represent the community; and the wise teacher will introduce a reform in teaching and school discipline no faster than he can carry the community along with him; and he will begin by reforming the community and the committee.

Teaching is coming more and more to be a profession; and one who prepares himself for the work, and continues in it, ought to be reasonably secure in his position, since it offers no hope of large pecuniary rewards, and security is in itself a reward. Through fear, perhaps, of the fickleness of committees, a movement was started last winter to secure a law making the tenure of teachers permanent. I signed a petition in favor of that law; but I was not disturbed by its failure, because practically the tenure is as secure now as it would be under the proposed law. The power of removal would have remained then as it does now. In our State nothing is permanent when the public demand a change. Even the judges, appointed for life, may be removed by abolishing the court; and when the committee remove a teacher against the will of the people, the committee itself may also fail to be re-elected. The competent teacher who can keep a good school will generally please the

people. In fact, the ability to so please is a prime factor in his competency; and such a teacher does not fail, once in a thousand times, to please the committee also. If a committee should become corrupt, and discharge a good teacher for the sake of a personal favorite, then the community is also corrupt if it does not reform the committee.

Committees are generally busy men, and they delegate a good deal of authority to the superintendent, and then do their duty by aiding him and watching him. This officer, then, becomes an important factor in school supervision. He ought to be a man of thorough education; an experienced teacher; a man with positive and definite opinions on all educational questions, yet not opinionated; a man without crotchets, or hobbies, or visionary theories; able to appreciate the value of a theory which he does not approve; careful of the rights of both teachers and pupils; capable of defending his views with force and earnestness, and equally capable of abandoning his position when he finds it untenable; open to argument; full of tact; courteous; honest and aboveboard; ready to drop dead issues; forgiving; easy to be entreated; patient; enduring all things, believing all things, hoping all things! There is no such man, to be sure; but the superintendent ought to approximate to this standard.

With an enthusiastic love for children, and a zeal according to knowledge, he is in a position to conciliate conflicting opinions often; and he may so bend all forces towards the one aim — the improvement of the young — that his influence for good upon the rising generation may be great.

As a rule, superintendents are teachers, promoted for their excellent work. And in them the teachers find helpers and friends, and the schools great profit!

A chief excellence in a school superintendent, it seems to me, is to discover superior teaching and spread it from school to school. In this way the bad disappears.

Another is to have the teacher free, as far as possible, and unhampered by every unnecessary restriction and regulation.

For, after all, the main business and profit of teaching rests with the teacher; and supervision is most useful in selecting the best teachers, and then in helping and not hindering their work.

Finally, none of us — neither the public nor the committee, neither superintendents nor teachers — should be impatient for results. The most worthless plants often grow rankest. Flesh and muscles receive quick nourishment, but nerve tissue and the substance of the brain grow slowly. And far more moderately are lasting improvements made upon human minds and character.

F.

FREE TEXT-BOOKS AND SUPPLIES,

BY

WILLIAM CONNELL,

SUPERINTENDENT OF SCHOOLS, FALL RIVER.

FREE TEXT-BOOKS AND SUPPLIES.

Massachusetts from her earliest days has been noted for the interest she has taken in the education of her youth. In 1642, while a colony, she passed her first educational ordinance. By this it became the duty of the selectmen of every town to see that parents and guardians taught, by themselves or others, their children and apprentices the rudiments of learning, under a penalty of twenty shillings. By the above act instruction was made general but not free. In 1647, an act was passed which is the basis of our free public schools. By this, every township of fifty householders was required to appoint a person to teach all children that might be sent to him, to read and write. The wages of such teacher were to be paid by the parents or guardians of the children sent, or by the inhabitants in general. It was also ordered that every town of one hundred families should maintain, in addition to its common school, a grammar (now called High) school for the fitting of pupils to enter the University.

Upon the foregoing basis, with such modifying enactments as from time to time seemed necessary for the better promotion of education, Massachusetts has to-day, perhaps, the best system of free public schools in the world.

Previous to 1873, children were required to provide such text-books and stationery as they might need in their school-work at their own expense. This fact prevented our schools from being absolutely free; and, in the case of poor parents who could not supply the articles necessary, because of their poverty, many children were deprived of school privileges, notwithstanding attendance, by law, was compulsory.

In this year the legislature passed a law permitting cities and towns to authorize their respective school committees to furnish

text-books to all the children in the schools free of cost. Comparatively few towns availed themselves of the provisions of this permissive act. Among those who did may be mentioned Fall River, Lowell, Woburn, Watertown.

In March, 1884, the following law was passed :—

SECTION 1. The school committee of every city and town shall purchase at the expense of such city or town, text-books and other school supplies used in the public schools; and said text-books and supplies shall be loaned to the pupils of said public schools free of charge, subject to such rules and regulations as to care and custody as the school committee may prescribe.

SECT. 2. Pupils supplied with text-books at the time of the passage of this act shall not be supplied with similar books by the committee until needed.

SECT. 3. This act shall take effect upon the first day of August, 1884.

The foregoing law is similar to that of 1873, the main difference being that the law of 1873 is permissive in its character, while that of 1884 is compulsory.

From the passage of the act in March, 1884, to the day it took effect in August, ample time was given for school officials to make all necessary preparations for carrying its provisions into effect. This time was utilized in obtaining information from those places which took advantage of the permissive act of 1873, respecting their method of purchasing, distributing and keeping the account of the various articles supplied teachers and pupils. It is believed that the law is now obeyed in every town in the State, and that an honest effort is being made to carry its requirements into practical operation.

But this, like all other laws, will be operative and of value only so far as it is in harmony with the genius of our government and enlightened public sentiment. A republican government rests upon the intelligence and virtue of the people, and Massachusetts, in order to promote these qualities in her citizens, has by law made attendance at school compulsory. If the State has the right to make attendance at school obligatory, then does it not follow that she should furnish at public expense the text-books and appliances necessary for the children to acquire the branches of learning taught in her public schools? On this basis the law is presumed to rest. This legislation

being of recent date, information bearing on the topic will be of general interest and value.

In December, 1885, a circular of inquiry was sent to the superintendents or school committees of most of the cities and larger towns in the State, for the purpose of ascertaining how the "free text-book" law was working, and to get the sentiment of the different places respecting its value. It contained the following interrogatories:—

1. How does the attendance in your schools, since the adoption of the "Free Text-book System," compare with the attendance previously secured under the old plan?
2. Does the new way of furnishing text-books induce parents to keep their children in school longer than they did under the old plan?
3. What effect, if any, has this system on the attendance in your High School?
4. Since the adoption of free text-books, what has the annual cost been?
 - (a) The aggregate cost each year.
 - (b) The cost per capita on enrolment each year.
 - (c) The cost per capita on average attendance each year.
5. In how many instances, if any, in your city, has it been ascertained beyond a reasonable doubt, by competent authority, that contagious diseases have been communicated from one pupil to another through the medium of free text-books?
6. What advantages, if any, has this new way of furnishing text-books over the old way?
7. What disadvantages, if any, adhere to this new system which did not adhere to the old one?
8. How is the system regarded generally (a) by the teachers (b) by the pupils and (c) by the parents?

Replies have been received from twenty-eight cities and towns, giving the information sought, so far as sufficient data were at hand upon which to base it, and make it valuable. The cities and towns that responded are:—Adams, Blackstone, Clinton, Chelsea, Cambridge, Fitchburg, Fall River, Gloucester, Lawrence, Lynn, Milford, North Adams, Pittsfield, Somerville, Somerset, Woburn, Weymouth, Ashfield, Attleborough, Brookline, Dedham, Framingham, Leominster, Northampton, Watertown, Westfield, Brockton and Haverhill.

The following extracts are inserted here for the purpose of

giving the information which the circular called for. To the fifth question, every place reports that free text-books have never been known to be the medium by which contagious diseases have been communicated from one pupil to another.

George B. Church of Ashfield says: "The new system has not been tried long enough to warrant a final judgment, but is regarded with favor by school officers and others who are interested in school matters. The supplies are furnished promptly, while, in the old way, scholars frequently had to wait a long time for them. Without doubt, if submitted to vote, the new way would continue." Cost per capita on enrolment: 1884, \$1.00; 1885, 84 cents. Cost per capita on average attendance: 1884, \$1.33; 1885, \$1.11.

Superintendent W. P. Beckwith of Adams says: "I know of several instances of children over fourteen years of age who have continued in school on account of the new way of furnishing text-books. Most of them are in the high school." In his school report he says: "The most important event of the past year has been a change, prescribed by an act passed by the legislature of 1884, by which cities and towns are required to furnish to the scholars in the public schools all necessary books and supplies without cost to the pupil. This law went into effect at the beginning of the fall term. There were many elements of uncertainty, even of perplexity, involved in the change. The principle had always seemed to me a sound one, and I have seen nothing in the practical working of the plan to change my views. The aggregate expense cannot fail to be much less than when individuals made the purchases separately. The average cost of the books is at least 35 per cent. less to the town than it formerly was to the pupil, and the reduction in the cost of supplies, such as paper, pens, pencils, etc., is very much greater than that. Besides, the books are put into the hands of all the pupils on the same day, and much time is thus saved at the beginning of every term. Of course the proper care of the books and other property makes some labor for the teachers, but I think they have found it less than was anticipated, and doubt if any of them would be willing to avoid the labor of the new system by returning to the annoyances of the old. The greater part of the extra work, such as marking and distributing the books, falls upon the superintendent or the

principals of buildings. Several teachers have mentioned to me the greater care which the children seem to take of the books than was formerly the case, and there is little doubt that their feeling of responsibility may be made the means of teaching them a useful lesson." He further says: "A possibly injurious effect of the system is that scholars leave the high school without any books belonging to themselves, and are, perhaps, therefore, less likely to regard the little collection, which such graduates formerly had, as a nucleus of a larger collection. It is also possible that it may increase the tendency to a feeling of dependence on the part of the pupil, but I do not believe it. The whole number of different scholars in our schools in a year, now, cannot vary much from 1,700, — with an average membership of about 1,325, and an average attendance of about 1,250. To supply these with books and materials, an annual expenditure of about \$1,500 will be necessary."

Superintendent B. B. Russell of Brockton says that the system saves time in the schools, because all the pupils are promptly supplied with the articles they need; that he knows of no disadvantages, and that the law is regarded favorably by teachers, pupils and parents.

Superintendent Scott of Blackstone says: "All the pupils are supplied promptly now, and at about two-thirds the expense of the old way to the parents."

Superintendent Crocker of Dedham says: "Books are now promptly furnished pupils. Much less friction with parents about supplying books. No disadvantages to the system worthy of note. That teachers and parents regard the plan favorably."

Superintendent O. B. Bruce of Lynn says: "Attendance has increased, — partly due to free text-books. Several parents send or continue their children *into* the high school by the new plan, increasing thereby the attendance to a large extent. The cost per capita on enrolment is \$1.63, and on the average attendance \$1.84. The system is favorably regarded by teachers, pupils and parents, although teachers complain of the extra trouble entailed by the system in ordering and in keeping account of books, etc. Another disadvantage becomes apparent, although it may be only fiction; that is, that the books are not as well made now as before, — more like Hodge's

razors, 'made to sell,' — at least that has been our observation."

Superintendent T. H. Day of Pittsfield says: "Our attendance has increased steadily since the adoption of the free text-book system, but I am unable to say to what extent the fact is due to that system."

In reference to the high school he says: "The attendance has greatly increased, but it is impossible to determine to what extent this increase may be due to free text-books." The average annual cost per capita he reports to be about fifty cents. "By the new system the cost is, of course, much less in the aggregate, and a very common cause of complaint by parents is removed. The system is regarded favorably by all."

Dr. F. A. Shurtleff of Somerset says that the advantages are better attendance, less expense for books, better school work, saving of time in organizing classes, and greater economy in the use of school supplies. The system is regarded with favor by teachers, pupils, and a majority of the parents. The cost per capita on enrolment is 75 cents, and on average attendance 87 cents.

Superintendent George R. Dwelley of Watertown says: "It is now fully ten years since this town deliberately adopted the 'free text-book system,' and it is not the new thing with us that it is in many places. The pupils have *all* the books needed, and they are supplied *when* needed. I should think the system perfect if the town would give to each child leaving the grammar schools, or the high school, the text-books used. As reference books in later life and in later studies they would put the child in better condition than he now is. The old method had this advantage."

F. B. Richardson of Woburn says: "It gives me great pleasure to respond to your circular of inquiry, for the reason that the subject of 'free text-books' has for a long period been of great interest to us, and, as far as I am able to discover, Woburn may claim the honor of being the first town in the State to avail itself of the permissive law of 1873, and issue to pupils necessary supplies free of expense. We have a larger per cent. of children whose parents are in indigent circumstances than any other town in the State; and as far back as 1866 Mr. Thomas Emerson, then superintendent of schools

here, claiming as authority Public Statutes, chap. 38, sects. 30, 31 and 32, recommended that the books furnished to pupils unable to buy their own, should be owned by the town and lent in successive classes. This practice became the established custom, and was followed until September, 1873, when, after a full discussion, the town voted to furnish all pupils with free text-books and other necessary supplies, thus exceeding the provisions of the statute passed by the legislature in March, 1873, which referred only to text-books. In the superintendent's annual report, published March, 1875, Mr. Davis says: 'Having tried this plan one and a half years we are prepared to speak with some assurance of its merits. We can assert with truthfulness that it has worked for the good of the schools unqualifiedly, and that we experience fewer petty annoyances on account of the purchase of new books.' Yet, strange to say, the vote authorizing free text-books was rescinded the same year, and the town returned to the old way of supplying them. In April, 1881, the town again voted to furnish text-books and other supplies free, and this practice has continued from that time till the present."

"More children of poor parents attend than before, and they are kept longer in school on account of free books. The advantages claimed are: every pupil has his books furnished the first day of school; he is compelled to habits of neatness in using them; and the plan secures uniformity of work, by having uniform quality of paper, pens, and blank books."

"The cost per capita on enrolment for 1882, 1883, 1884 and 1885, was 85, 88, 57 and 91 cents, respectively; and the cost per capita on the average attendance for the same years, was \$1.14, \$1.11, 75 cents, and \$1.33."

Superintendent S. A. Bent of Clinton says: "Since the adoption of the free-book system in this town, a difference of from five to ten per cent. is noticeable in increased attendance in grades from eight to the high school inclusive. Cost per capita on enrolment, \$1.18; and on average attendance, \$1.38."

Superintendent E. H. Davis of Chelsea says: "In high school the attendance is considerably larger than last year. Cost per capita on enrolment, about one dollar."

F. S. Cutter, agent committee on supplies of Cambridge,

says: "Attendance increased more than usual, and in the high school a great gain.

"Cost per capita on enrolment, \$1.29; cost per capita on average attendance, \$1.66. Stationery not included in above."

"The advantages of the new way of supplying books are: (1) Economy to the people. (2) School work begins more promptly; and (3) The children receive greater training in habits of cleanliness and caring for books, owing to the system in vogue in Cambridge of constant inspection by the teachers and the agent.

"The disadvantages are: (1) Time is taken from teaching for the work of distributing and caring for books and supplies, and for keeping necessary accounts. (2) Under the former system families, as well as the pupils themselves, derived certain advantages from *owning* text-books of practical value; especially was this the case in instances where the text-books were about the only books of value the family possessed."

Superintendent M. L. Hawley of Gloucester reports the cost per capita on enrolment for 1884 and 1885 to be \$1.40 and \$1.19, respectively; on the average attendance for the same years, \$1.68 and \$1.48. He claims advantages for the new system, and says that it is regarded favorably by all.

In Framington, O. W. Collins reports the cost per capita on enrolment to be \$1.00; and on average attendance, \$1.18.

He says: "This system is liked by teachers and pupils, but despised by committee and tax-payers. It has no advantages."

Superintendent W. T. Leonard of Milford reports cost per capita on enrolment, first year, \$3; second year, \$1. On average attendance, \$3 + for first year; and for second, \$1. The system, he says, "is most thoroughly liked by all friends of the public schools"

Superintendent J. L. Brewster of Lawrence cannot report cost because of insufficient data. He says that the attendance is better in higher grades, and he claims great advantages for the new system. He says: "I fear that one marked disadvantage or evil will appear as the years go on; viz., the increased feeling that everything must be supplied at the public expense, that the parent has no responsibility for his own. The system is favorably regarded by all, — teachers, pupils and parents. I think the system has come 'to stay'; that it will be

stronger each year; and that it logically belongs to the public school system."

Superintendent J. Freeman Hall of Leominster reports cost per capita on enrolment about \$1, and on average attendance about \$1.50. He says: "The system has advantages and is regarded with favor."

Superintendent G. C. Fisher of Weymouth reports cost per capita on enrolment to be \$1.20, and on average attendance, \$1.40. "The system," he says, "is regarded favorably all round."

Superintendent J. G. Edgerly of Fitchburg replied as follows:—

"FREE TEXT-BOOKS AND SUPPLIES."

Expenditures for the year,	\$4,121 62
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PER CONTRA.

Sales of books and supplies,	122 55
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Net expenditures,	<div style="border-top: 1px solid black; display: inline-block; width: 100%;">\$3,999 07</div>
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"Of this amount it is estimated that the sum of \$250 was expended for books and supplies for evening schools, leaving the expenditures for day schools \$3,749.07.

"The books and supplies furnished the evening schools are kept separate from those belonging to the day schools, book-cases being provided for each school.

"The cost of books and supplies per pupil in day schools, for the year, was \$1.18 based on whole number registered, and \$1.62 based on average daily attendance.

"The amount received from sales (\$122.55) includes the money received for books and supplies lost or injured—for which pupils are responsible—and also the amount received from pupils who prefer to buy their books. The teachers collect the money from pupils that lose or injure books and supplies, and they also sell books or articles to pupils at cost. The teachers pay the money so collected to the superintendent and he to the city treasurer.

"An opinion prevailed to some extent, before the law went into operation, that a great many parents would prefer to buy books for their children, rather than allow them to use the

books furnished at the expense of the city. That this opinion is not sustained, is evident from the fact that the cost of all the books and supplies purchased by pupils in this city, from Dec. 1, 1884, to Dec. 1, 1885, is less than \$75.

“In relation to the practical working of the law, the testimony of several teachers is submitted :

“Principal HULING of the High School :—

The system of free text-books has been in practical use in this school one year and four months. It has been found to have its advantages and disadvantages, the former so greatly predominating that we should be unwilling to abandon the plan, even if the law allowed such change, as, of course, it does not.

The great advantage lies in the fact that all school supplies are at the control of the teacher, and no delays by reason of absence of such helps need occur. If they do occur, it is because the teacher has neglected to take time by the forelock.

The books appear to be used with as much care, certainly, as when the ownership was private. Indeed, since the teacher has some responsibility in the matter, more care is secured. For the year ending July 3, 1885, the books issued numbered 1,673. Of these it was found necessary to re-bind 75 before using them again. The fault, however, was plainly in the flimsy character of the binding in the case of 50 of these. In the other 25 there appeared to have been some carelessness in handling, but very little was culpable. Instances of defacing are not numerous.

A great help in the care of books is insistence that they shall be covered. Paper for this purpose is provided, and the pupils do the work, after a little practice becoming very expert in the matter. The covers not only protect the books from soiling, but save abrasions and strengthen the binding. Upon them are written the names of the pupils, and any other inscriptions that might find a place upon the book proper.

How far the saving to the parents by this system has explained the large increase in the size of the school (over 20 per cent.), cannot be exactly determined. Since the increase is in the direction of the remaining for a longer time of the pupils already in attendance, rather than in that of an arrival of new pupils, it seems probable that its effect is not very great, the general popularity of the school, and the difficulty of obtaining lucrative employment in business, being more efficient explanation of the increase.

We do not perceive any disadvantage arising from the lack of permanent ownership on the part of pupils. It was, and is, possible for

pupils so desiring to purchase their books and supplies. Last year 33 persons availed themselves of this privilege and bought 57 books ; only one, however, bought all the books needed. Some of the teachers encourage the making of private note books in certain studies, which are illustrated with some care and are retained by the pupils.

The chief disadvantage of the system is the additional labor imposed upon the teacher by it. This is considerable, in view of the exacting demands of preparation for successful high-school work. A system of order blanks and ledgers is in use, the result of which is that, every book being numbered, at any time all books loaned to any pupil can be ascertained, and also the whereabouts of any particular book. Furthermore, the number of pencils, blocks of paper, and other supplies issued to any pupil can be learned. These details seem to be needed as checks upon tendencies to wastefulness and carelessness. In a school of 220 pupils the pursuance of this plan involves intelligence, watchfulness, and much writing. Last year this was assumed by our librarian alone, in order that one mind might supervise the whole. The task was too great, however, and a wiser one is now in use. The work of delivery is effected by three pupils ; one of whom delivers books, another pencils, pens, etc., and the third paper and blank books. The diligence and efficiency of these helpers calls for the mention of their names ; viz., Austin E. Carpenter, William Tucker and George F. Whittemore. In the work of writing up the ledgers the lady assistants have rendered valuable service. The whole is under the direction of the librarian. Thus the work is distributed among seven persons and appears to bear heavily upon no one. Doubtless future experience will develop other improvements upon the original plan.

RAY GREENE HULING, *Principal*.

E. ADAMS HARTWELL, *Librarian*.

“ Principal WINCH : —

In replying to inquiries concerning the free text-book law, I will say that the school has a larger membership, and a higher percentage of attendance than before. The system also secures a better average of daily work, as it removes the oft repeated excuse “ no book.”

Some one asks “ What is its effect upon the pupils ? ” My experience has been that it in no way lessens their regard for the privileges afforded them ; but, on the contrary, some fully appreciate the advantages ; while upon others the enforced carefulness and neatness will doubtless become a lasting trait. On the whole the better care taken of the books is everywhere noticeable.

Finding the above the case, the results of the new statute must be beneficial.

Such gains and the removal of various perplexities more than counterbalance the extra work entailed upon the teacher.

GEORGE WINCH,

Principal Day Street Grammar School.

“Principal HASTINGS:—

Although this system of furnishing books has been in use but a short time, the following advantages have been noted in my room; viz.:

1. Increased membership.
2. Increased daily attendance.
3. The period of attending school is lengthened.
4. Better care is taken of the books.
5. Every pupil has the desired book at the given time.
6. The labor of the teacher is not increased perceptibly.

GEORGE H. HASTINGS,

High Street Grammar School.”

In Fall River, the free text-book system is regarded with great favor by all classes, and this has been the case ever since its adoption in 1873. It has increased our attendance, especially in the upper grades; and, in consequence of it, many parents have been enabled to keep their children in school longer than they could have done under the old plan. Our teachers like it, and say that the time occupied in distributing and caring for the books and other supplies is very much less than that they were obliged to waste in trying to get every child supplied with the materials necessary for school work, in the old way. They do not complain of the labor; in fact, it is not much when properly systematized. Having had an experience of twelve years in this work, if there are great disadvantages attending it, we should have discovered them before this. The cost on enrolment for a series of ten years is 64 cents on the average *per capita*; and on the average attendance for same time, per year, \$1.10.

Text-books should be purchased directly from publishers, at their special wholesale prices, subject to the largest discount known to the trade. Other supplies should be purchased in a

similar manner, — from the manufacturer, if possible ; but when not so, then as near to him as practicable, so as to avoid the expense of handling the goods by middlemen. Cities and towns should be able to purchase goods at bottom prices ; and, if so procured, they can provide all the supplies necessary for their respective schools at from one-third to one-half less than it would cost the pupils if they bought them separately, at retail. In the case of small country towns, this method may not be practicable at all times ; yet, as a rule, it should be followed when possible.

By this method, publishers can be held directly responsible for the quality of their books, including the paper, typography, illustrations and binding. Manufacturers of other supplies will also feel the necessity of furnishing such articles, as good in quality as represented, at a fair profit above cost. By this arrangement, a more uniform quality of goods can be secured, and the quality of a higher grade than would probably be furnished otherwise.

Having purchased the goods, the next step is to make proper rules and regulations as to the care and custody of the same, in the schools. This involves the necessity of keeping an account by the school committee of the supplies furnished the different teachers, or at least the different buildings, and an account, also, by the teachers of those loaned the different pupils.

The following are the rules and regulations in use in the city of Fall River, and may serve as an illustration on this point :—

Principals of buildings shall order, in writing, the number of each text-book and school-supply needed for the schools in their respective buildings, from the superintendent, who shall thereupon furnish the same and charge them to said teacher, in a book to be kept by him for the purpose.

Principals shall be held accountable for all articles sent to their respective buildings ; they shall charge their subordinate teachers with the supplies delivered each, and they in turn shall keep a strict account of what they furnish each pupil. In case of loss or undue injury, they shall require the article or book to be replaced at once.

Teachers shall label, or cause to be labelled, all text-books with some appropriate inscription designating them as city property. They

shall also cover, or cause to be covered, the books used in their respective schools.

They may allow their pupils, when necessary, to carry their books home for study.

To deface or destroy any school property must be regarded as a serious offence.

Teachers shall, at the close of each term, render an account to the superintendent, of all the text-books on hand. In case of loss of any article by their neglect, they shall be required to make it good.

The following is a copy of the label required to be pasted in each book. In buildings containing several rooms, the books are numbered so as to indicate the room to which they belong and the pupil to whom they are loaned.

PROPERTY OF THE CITY OF FALL RIVER.

This Book is loaned to pupil No. Room of

..... School,

ON THE FOLLOWING CONDITIONS:

1. It is to be carefully used and not marked or defaced.
2. It is not to be taken from the school-room without the consent of the teacher.
3. If lost or injured it is to be paid for by the pupil using it.

The following is a copy of a requisition in blank which principals of buildings make on the superintendent for supplies at the beginning and middle of each school year : —

ORDER No.

FALL RIVER, MASS.,

188

Supt. of Schools: Please send me for
 School the following supplies, being the whole amount
 due the building for semester beginning 188 as per
 schedule on cover. Average number of pupils belonging in primary
 grade ; in intermediate ; in grammar .

Gross Crayons.
 Boxes Slate Pencils.
 Slates (6 x 9, 7 x 11, 8 x 12).
 Lead Pencils.
 Quires Foolscap.
 Quires Practice-Paper.
 Writing Books.
 Blackboard Erasers.
 Drawing Books.
 Pass Books.
 Blotters.
 Qts. Ink.
 Gross Pens.
 Rubbers.
 Penholders.
 Composition Books.
 Arithmetics.
 Arith. Prob. Books, grade.
 Geographies.
 Spelling Books.
 Singing Books.
 Readers.
 Readers.
 Readers.
 Histories.
 Grammars.

Physiologies.
 Dictionaries.
 Child's Histories.
 Ray's Test Examples.
 Bottles Mucilage.
 Numeral Frames.
 Drawing Paper.
 Pointers.
 Globes.
 Music Charts.
 Ink-stands.
 Maps.
 Book Covers
 (12 x 16, 16 x 22, 20 x 30).

To be sent to Supt. during the last week of semester properly
 filled out.

Principal.

School.

This is printed in duplicate on the same page, and perforated in the centre, so that one can be torn off, leaving the other as a *stub*. The one that is torn off is sent to the superintendent and serves as a voucher, the other remains in the book as a *stub*, and is checked when the goods are received by the principal.

Each subordinate teacher, in charge of a room, is furnished with a similar book, similarly printed, for making requisitions for supplies on their respective principals, at the beginning and middle of each school year. The blanks, when filled out by subordinate teachers, are sent to principals, and they serve as vouchers for the goods delivered by him to each teacher, who in turn checks on the *stub* the goods received as per order.

In a book provided for the purpose, each teacher now writes the names of her pupils, and against each enters the articles and books furnished each. This account can, in many schools, be kept in the school register; and to do so requires but little writing, for the entries can be made against the names as there recorded.

As a guide to teachers in making requisitions for text-books, and other supplies, the following tariff has been prepared, and is printed on the second page of the cover of their requisition books, so as to be convenient for reference. The same tariff would not meet the wants of every place, for the difference in quantity of work required in schools of different towns would cause a corresponding change in the articles on the list.

SCHEDULE OF SUPPLIES, AND QUANTITIES OF EACH, FOR ONE YEAR'S USE
IN THE PUBLIC SCHOOLS OF FALL RIVER.

The following quantities of school supplies are considered to be sufficient for one year's use in the respective grades for the number of pupils indicated. Principals, in order to find the proper quantity of each article, when ordering for their buildings, will base their calculations on the average number of pupils belonging to each grade. Should the quantity thus found be insufficient to last a year, more will be furnished if shown to be necessary.

Primary Grade.

3 Gross Crayons to each 100 pupils.

4 Slate Pencils to each pupil.

20 Slates to each 100 pupils.

1 Lead Pencil to each pupil in Third Reader.

- 4 Quires Foolscap to each 100 pupils.
- 1 Ream Practice-Paper to each 100 pupils.
- 1 Writing Book to each pupil in Third Reader.
- 8 Blackboard Erasers to each 100 pupils.

Reading Books in this grade should last as follows: First Reader.

1 year; Second Reader, 2 years; Third Reader, $2\frac{1}{2}$ years.

Intermediate Grade.

- 4 Gross Crayons to each 100 pupils.
- 4 Slate Pencils to each pupil.
- 20 Slates to each 100 pupils.
- 100 Lead Pencils to each 100 pupils.
- 4 Reams Foolscap to each 100 pupils.
- 2 Reams Practice-Paper to each 100 pupils.
- 4 Writing Books to each pupil.
- 15 Blackboard Erasers to each 100 pupils.
- 2 Drawing Books to each pupil.
- 2 Pass Books to each pupil.
- 4 Blotters to each pupil.
- 5 Quarts of Ink to each 100 pupils.
- 5 Gross Pens to each 100 pupils.
- 1 Rubber to each pupil.
- 20 Penholders to each 100 pupils.

Text-Books in this grade should last as follows: Arithmetics, 3 years; Geographies, $2\frac{1}{2}$ years; Spelling Books, 4 years; Singing Books, 6 years; Readers, 3 years.

Grammar Grade.

- 6 Gross Crayons to each 100 pupils.
- 4 Slate Pencils to each pupil.
- 20 Slates to each 100 pupils.
- 1 Gross Lead Pencils to each 100 pupils.
- 6 Reams Foolscap to each 100 pupils.
- 2 Reams Practice-Paper to each 100 pupils.
- 2 Writing Books to each pupil.
- 20 Blackboard Erasers to each 100 pupils.
- 2 Drawing Books to each pupil.
- 4 Pass Books to each pupil.
- 4 Blotters to each pupil.
- 10 Quarts of Ink to each 100 pupils.
- 8 Gross Pens to each 100 pupils.
- 1 Rubber to each pupil.
- 20 Penholders to each 100 pupils.
- 1 Composition Book to each pupil.

Text-Books in this grade should last as follows: Geographies, Problem Books and Grammars, 3 years; Histories and Arithmetics, 4 years; Spelling Books, Readers, Physiologies and Ray's Test Examples, 5 years; Singing Books, 6 years.

Slate and Lead Pencils, Drawing and Writing Books, Pens and Rubbers, should be collected after each exercise in which they are used, especially in the lower grades.

Principals will be held accountable for all the articles sent to their respective buildings; they shall charge their subordinate teachers with the supplies delivered each, and they in turn shall keep a strict account of what they furnish each pupil. Articles not placed on the above list, principals will order as needed.

Pupils in the upper grades should be taught to cover their own books in a neat and proper manner. Teachers should appoint committees to aid in the work of distributing, and in keeping a proper account of all school supplies used in their respective rooms. This makes a valuable experience in practical book-keeping of a simple character to many of the pupils.

The value of this law can hardly be overestimated, especially in manufacturing centres, where illiteracy and poverty are so common. It aids in promoting intelligence and virtue, by increasing school attendance, and it lifts from the worthy poor a burden hard for them to bear. It is one of the most progressive steps the State has taken for the education of her youth. It requires the rich and the poor to meet on the same plane, as they sit side by side applying themselves to the tasks assigned for the acquisition of knowledge and mental power. It removes the last barrier to the entrance to her public schools, and gives opportunity to the child of poverty, equal to that of the child of affluence, to become one of her intelligent and virtuous citizens. In a word, it opens her schools to every child within her borders, whatever may be his nationality or social condition in life, and makes them for him, not only in name but in every essential quality, truly and absolutely free public schools.

WILLIAM CONNELL.

FALL RIVER, January, 1836.

G.

METHODS OF TEACHING IN GERMAN SCHOOLS,

BY

LARKIN DUNTON, LL. D.

HEAD MASTER OF THE BOSTON NORMAL SCHOOL.

METHODS OF TEACHING IN GERMAN SCHOOLS.

The methods of teaching employed in any system of schools can be perfectly understood only by seeing them in use. We can learn the principles on which they are based by reading; but after we have done with reading, our knowledge is wanting in an important element. The manner of the teacher, his spirit and bearing toward his pupils, the effect of the teaching as determined by the ability and character of the children, the effect of national temperament and social customs upon both pupil and teacher, — these and many other circumstances that largely determine the effect of particular methods of teaching must be learned, if at all, mainly by observation.

Now, as direct observation of German teaching is impossible to-day, the next best thing is a verbal picture of some lessons as they are actually given. I will, therefore, attempt to picture two or three lessons in this way; and, afterwards, to make a partial analysis of the methods employed, and then to indicate the conditions under which these methods have been developed.

A LESSON IN ARITHMETIC.

The first sketch shall be that of a lesson in Arithmetic, given to a class of children about seven years old, who had been in school eight months and a half. The school was in the city of Munich, and was in charge of Herr Rudelsberger, one of the most skilful practical schoolmasters that I met in Germany. The lesson was given by a lady, — strong, vigorous, clear-headed, earnest, and, withal, kind-hearted, and sympathetic with her pupils.

In order to perceive the purpose of this lesson the more clearly, divide the work of Arithmetic roughly into three stages; 1. Developing the ideas of numbers and their rela-

tions by means of objects; 2. Familiarizing the pupils with the relations of abstract numbers, — drilling, memorizing; and, 3. Applying arithmetical principles to the solution of practical problems. This was a lesson given during the developing, or objective stage.

The arrangement of the room was the same as one finds almost invariably in Germany. The teacher is on a side of the room where there are no windows; the pupils sit facing the teacher, and the light enters only through windows at the left of the pupils.

At the teacher's left, in the corner of the room, was a *rechnemaschine*, a wooden frame, four or five feet high and three or four feet wide, with iron rods running across it, upon which were wooden balls as large as apples. These were arranged in groups of ten each, upon the rods, and could be easily moved with a pointer.

At the teacher's right, in another corner, was a blackboard. Upon this she had made some dots with white chalk, half or three quarters of an inch in diameter, and arranged as follows: at the top of the board, in a line running from left to right, were nine groups of two dots each; below these, six groups of three each; then came four groups of four each, and one group of two; below these, three groups of five each, and one group of three; next, three groups of six each; then, two groups of seven each, and one group of four; still below, two groups of eight each, and one group of two; and, lastly, were two groups of nine balls each.

The teacher went to the numeral frame, moved out ten balls on the upper rod and seven on the next rod, and, pointing to the seven balls, asked, "How many balls are there?" A child replies, "There are seven balls." The teacher, suiting her action to the words, "If I put one ball with seven balls, how many balls are there?" A child answers, "There are eight balls." T. "Then 17 and 1 are how many?" Ch. "17 and 1 are 18."

T. Pointing to a row of ten balls, "What have we here?" Ch. "There is a ten." T. "How many balls in a ten?" The child could not tell, so the teacher moved part of the balls away from the others, so that each division could be seen, and the child at once answered, "There are 10 balls in a ten." T.

“How many balls are there here?” pointing to the eight. Ch. “There are 8 balls.” T. “Then in 18 balls there are how many tens, and how many units?” Ch. “In 18 balls there are 1 ten and 8 units.”

The teacher moves one ball away, and, pointing to the rest, asks, “How many balls are here?” Ch. “There are 17 balls.” T. “Now I put one with the 17; how many now?” Ch. “There are now 18.” T. “Then 17 and 1 are how many?” Ch. “17 and 1 are 18.” T. “How many are 1 and 17?” pointing first to 1 ball and then to the 17. Ch. “1 and 17 are 18.”

The teacher now moves 2 balls apart, and asks, “How many balls are here?” pointing to the two. “How many here?” pointing to those left. “How many here at the left. How many here at the right? 2 from 18 leaves how many? 16 from 18 leaves how many?”

“If I leave eleven here, how many do I put away? Then how many must I put with 11 to make 18? How many balls are there here?” pointing to the ten? “How many here?” pointing to 1. “How many together?” pointing to 1 and 10. “How many here?” showing the 7. “And how many here when I put the 7 with the 1?” “How many then are 11 and 7? 18 less 7 are how many?” moving back 7 balls from the 8 leaving 1. “18 less 11 are how many? Then how many must I put with 11 to make 18? How many with 7 to make 18?”

T. “How many are 18 less 6?” The child called upon could not answer, and the teacher continued, “8 less 6? Show it on your fingers,” pointing to the child, who hesitated. Here the child began to cry. “Oh don’t cry,” says the teacher cheerily, “that is the way the little children do, not the children in school. That is right,” added the teacher, as the little one resumed its work. “Then how many are 18 less 6?”

T. “9 and 3 are how many? Reckon to 10 first.” Ch. “9 and one are 10; and 10 and 2 are 12; therefore 9 and 3 are 12.” T. “Reckon from 9 to 16.” Ch. “9 and 1 are 10; and we must put 6 with 10 to make 16; so we must put 7 with 9 to make 16.”

T. “18 less how many is 9?” Ch. 18 less 8 is 10; 10 less 1 is 9; so 18 less 9 is 9.”

T. "16 less how many is 9?" Ch. 16 less 6 is 10; and 10 less one is 9; so 16 less 7 is 9."

At this point the teacher sent one child with a pointer to the large numeral frame, and went herself to the blackboard, upon which the dots had been made in 2's, 3's, 4's, etc.

T. "How many dots here?" pointing to the first 2 dots. "How many here?" pointing to the next 2. "How many together? How many 2's? How many times can you take 2 from 4? How many 2's in 4?"

T. "How many here?" pointing to the next 2. "How many in all?" showing the three 2's. "How many times can I take 2 from 6? How many 2's in 6? How many 2's here? Count them." Ch. "One 2, two 2's, three 2's, four 2's."

T. "How many in all? How many times can I take 2 from 8? How many 2's in 8?"

T. "How many 2's here? How many times can I take 2 from 10? How many 2's in 10? In 12? In 14? In 16? In 18?"

All this time the child at the frame moves out the numbers of balls corresponding to the dots which the teacher shows on the board.

The teacher continues. "How many times 2 in 18?" Ch. "8 times 2." T. "Come here and show me. Take the pointer and count." The child takes the pointer, and, pointing to the dots in order, says, "Once 2 is 2, 2 times 2 are 4, 3 times 2 are 6, 4 times 2 are 8, 5 times 2 are 10, 6 times 2 are 12, 7 times 2 are 14, 8 times 2 are 16, 9 times 2 are 18." T. "Then how many 2's in 18?" The child still hesitates. T. "Who can state the question?" Ch. "How many times can we take 2 from 18?" T. Pointing to the first group of two dots as though they were pushed away from the rest, while the child at the numeral frame pushed back 2 balls. "How many times have I taken 2 away? Now how many times have I taken 2 away," pointing to the next group of two balls; and so on to the end, while the child counted.

T. "Into how many parts is 18 divided, when I have taken away 2 as many times as I can? Count them. Then 2 is what part of 18? Why?" Ch. "If a number is divided into 9 equal parts one of those parts is one ninth of the number."

T. "Of what number is 2 the half? Of what number is 2

the third part? The fourth part? The fifth? The sixth? The seventh? The eighth? The ninth? Then 2 is in 18 how many times.?

T. Pointing to the 3's. How many are 3 and 3? 3 and 6? 3 and 9? 3 and 12? 3 and 15? How many 3's have we there?" pointing to two 3's. "How many 3's have we when we put 3 with 6? Then how many 3's in 9? How many 3's when we put 3 with 9? Then how many 3's in 12? How many 3's when we put 3 with 12? Then how many 3's in 15? How many 3's have we when we put 3 with 15? Then how many 3's in 18?"

T. "How many are 5 times 3? How many are 5 times 3 and 2? I now add another point to the two. How many dots here?" pointing to the group of 3's thus completed? "How many times 3 have we now? What have you now learned?" Ch. "We have learned that 18 is 6 times 3."

T. "Count by 3's." Ch. "Once 3 is 3, 2 times 3 are 6, 3 times 3 are 9, 4 times 3 are 12, 5 times 3 are 15, 6 times 3 are 18." T. "How many times can we take 3 from 18? Into how many parts have we divided 18 now? Count them. One of these parts is what part of 18? Then 3 is what part of 18? When I take away one part, how many parts remain? Then 3 is in 18 how many times? How many times is 3 contained in 15? In 18? In 12? In 9? In 6? 2 in 18 how many times?"

Here the hour was past and the lesson immediately stopped. During all the time that the teacher was at the blackboard, the child at the numeral frame had been using the pointer, moving the balls so as to show everything that the teacher had illustrated with the dots. The lesson lasted a full hour, and the attention of the class was well sustained to the end. It was one of the most systematic lessons in arithmetic that I have ever heard.

The next day the class worked on the number eighteen another full hour. The teacher first took the pupils over much the same ground as in the lesson that I have just described; but varied her work by omitting the use of objects as soon as the points had been illustrated once or twice, except when some child failed to answer. The new ground gone over was the division of 18 by 4 and by 5.

A FIRST LESSON IN READING.

I will now attempt a description of the first lesson that I heard in a German school. It was a lesson in reading in the lowest grade of a common school, in the city of Berlin. The children were six years old and had been in school one day, so that, practically, I entered with the class. The school was in charge of Rector Becker, an able and experienced principal in the city; but this particular lesson was given by a young lady, a Miss Bonus. She was vivacious, energetic, and, as you will see, able to do just what she attempted to do. She had been busy the day before, writing names, pacifying the timid, etc., so that she had given the class only one lesson. This was an object-lesson on the egg. The lesson which I am about to describe, however, was the first in a series, the object of which was to teach the children to read and write.

To understand the lesson, we must spend a moment in putting ourselves at the point of view of a German teacher, in the matter of learning to read. Reading, as he views it, may be mechanical, intellectual, or æsthetic. In the first stage the pupil calls the words in a manner more or less mechanical. In reaching this stage, he is occupied but little with the thought or the sentiment; he is doing only what is necessary to enable him to call the words. In the next stage of his progress he is occupied mainly with the acquisition of the thought, and in its expression. In the third, or æsthetic stage, he is engaged chiefly in mastering and practising the correct expression of the thought and sentiment of the selection upon which he is at work.

These three stages are reached in the order named,—the mechanical, the intellectual and the æsthetic; and, consequently, the teaching of reading must conform to this order. These stages are divided, of course, by no fast lines; and, therefore, the teaching at the different periods overlaps somewhat; but yet the main effort of both teacher and pupil must be exerted in the order named.

Furthermore, the first stage is reached by three distinct steps,—learning sounds, learning signs of sounds, and associating signs and sounds so that the one will recall the other.

The knowledge of sounds is partially acquired in the process of learning to talk, before the child goes to school. He now needs only to have the combinations analyzed for him, so as to bring into distinct consciousness what is known vaguely in combination. But the forms which are to stand as the signs of the sounds are wholly unknown. These are to be mastered at the outset; and the German teacher believes that this can best be done by first giving the pupil a knowledge of the order and manner of making the separate parts of which the forms or letters are composed, and then requiring the pupil himself to make them.

Now, in this first lesson that I heard, which was also the first lesson given to the pupils, the work was devoted to this special point; namely, to teaching the children to make a form which, they were to learn subsequently, stands for a particular sound.

The teacher began by holding up an egg before the class, and asking, "What is this?" The children reply, "An egg (*ein Ei*)."

The teacher then told the children to take out their slates and lay them softly on the desks, or benches, before them. She then exercised them a minute, in some simple motions that she had taught them the day before. These were: "One," laying the hands flat upon the near front edge of the desks; "two," putting the hands, in the same position, upon the back edge of the desks; and "three," folding the hands and laying them on the front edge of the desks.

By this means the children were all brought into order and the attention fixed upon the teacher. "Now," said the teacher, her face fairly radiant with sympathy and pleasure, "take your pencils. So; not so;" showing, with her own pencil, what to do and what to avoid. The children imitated as well as they could; but not more than half a minute was spent upon this instruction.

The teacher then took the egg again and asked, "What is this?" The children reply, "An egg." "Now," said she, we will write it. All look at me. Up," making a long, upward, inclined stroke with the chalk, upon the blackboard.

"Now," said she, turning to the class, "move your arms so," at the same time moving her own arm as though she were making the stroke in the air. All the children imitated the

teacher as well as they could, and, at the same time, she repeated her former command, "Up."

She then turned to the board, and beginning at the top of the stroke already made, drew another line downwards, thicker than the first, and in a direction less inclined to the horizon; and as she did this she gave the order, "Down." She then turned to the children and repeated the motion in the air, and also the command, "Down;" and then all the children made the same motion, while the teacher repeated the order "Down."

Next, beginning on the right of the line last made, and about one-third the distance from the top, she made an upward stroke, inclined to the right, and extending to the height of the second line, and at the same time said, "Little bridge." She then turned to the class, repeated the motion in the air, and again gave the command, "Little bridge," and the children repeated the motion.

The teacher then began at the top of the line last drawn, and drew a stroke downwards, parallel to the second line and of the same length, saying at the same time, "Down." This motion was repeated by the teacher as she faced the class, and also the command given again; and the motion was imitated by the children.

She then began at the bottom of the last line drawn and made a light line inclined toward the right, parallel to the first line drawn and equal to it, saying, "Up." This command was repeated by the teacher, and the motion imitated in the air by both teacher and children.

Then, beginning at the top of the last line, she drew a line downwards, parallel to the first and third lines, and of the same length, saying at the same time "Down." This command was repeated by the teacher, and the motion imitated by both teacher and children.

Finally, beginning at the bottom of the line last drawn, she drew a line inclined upwards, parallel to the first line drawn, and of the same length, saying at the time, "Up." This was immediately followed by making a dot over the last downward line, the teacher at the same time saying, "Point." She then turned to the children and repeated her motions and directions; and the children imitated the motions with much force and

considerable amusement, and especially the motion of making the dot.

All eyes were now turned to the board, and the teacher made the same lines in the same order; and also described the process line by line as she wrote. The description ran thus, "Light upwards, heavy downwards, little bridge, heavy downwards, light upwards, heavy downwards, light upwards, point;" or, untranslated, "Leicht herauf, stark herunter, kleine Brücke, stark herunter, leicht herauf, stark herunter, leicht herauf, punkt."

Thus the word *Ei* (*egg*) was written. This writing and describing the process, line by line, was repeated several times. Then came the repetition of the process in the air by the children as the teacher directed, "Leicht herauf, stark herunter, kleine Brücke, stark herunter, leicht herauf, stark herunter, leicht herauf, punkt." The formula was then repeated by the children while the teacher wrote in the air; then while the teacher wrote on the board; then while they both wrote in the air; the word "punkt" and the corresponding motion being given by the children with great glee.

"Now," said the teacher, "you may write on your slates." When the slates and pencils were all in order, the teacher said, "Now look at the board," and made the first line as before, saying, "Light upward. Now write, Light upward." When the children had written this upward stroke on their slates, the teacher said, "Look," and wrote the second line, adding, "Heavy downward, write, heavy downward."

Thus the alternate writing and describing by the teacher, and directing by the teacher and writing by the pupils, went on, line by line, to the end of the word; and then the same process was repeated in the same order, till the children had made perhaps a dozen attempts under this minute direction.

"Now," said the teacher, "we have written *egg*; and you must each write a whole slateful in rows, thus," pointing to the board. She then went down among the children to help those who needed help, while the words rang out continuous and clear, "Leicht herauf, stark herunter, kleine Brücke, stark herunter, leicht herauf, stark herunter, leicht herauf, punkt." As the teacher moved from child to child I heard the words, "Good, good, beautiful;" while the little eyes sparkled, and

the little faces beamed with delight. Once I heard the remark, "No, not at the bottom; there, kleine Brücke; good, beautiful." The teacher constantly assisted the children, now writing for them, and now guiding the little hands; but during all the process, the old, "Leicht herauf," etc., was continually repeated.

At last, however, a child was found who could direct; and then came solemnly from the little throat the then familiar words "Leicht herauf," etc.; but the children all kept on writing. Once only during this part of the lesson was the class stopped long enough for the least rest, and then only to look at the letters on the board and to receive additional instruction in regard to the beginning of the lines.

The purpose of the lesson was to fix in the minds of the children the exact forms of the letters to be taught, and of the motions required to produce them; and at the same time to associate with every line of the letters and with its corresponding form a descriptive name; so that, subsequently, the use of these names would suggest to the pupils both forms and constructions.

The lesson lasted about three-quarters of an hour; and what struck me with force at the time was the fact that the children worked so long within so narrow limits of variation without signs of fatigue.

Now is there any doubt in your minds, any more than there was in mine, that the teacher had a definite purpose and kept a constant aim; and that the reason of this was that she knew what she wanted to do, the principles that were to govern her teaching, and the exact methods by which she was to be guided?

But the teaching of the word *Ei* did not end here. The writing of this word was assigned for a home lesson; and I had the pleasure of seeing the results, which were in many cases very fine. More than this, most of the reading hour the next day was devoted to a review of the work of this lesson.

The result of all this was that the children knew how to make two letters of the German alphabet.

The third lesson to this class, on this subject, dealt with the word *Hut* (hat) in precisely the same way. The children then knew how to write two words, *Ei* and *Hut*.

It was not till the fourth lesson that the third stage of mechanical reading was approached, namely, the associating of sounds with their signs; and the work at this lesson was confined to the two words already learned. The lesson was managed as follows: —

The teacher wrote *Ei* (egg) on the board and asked: “Who can read it?” The reply came from most of the class, “*Ei*.” The teacher then repeated the word very slowly, at the same time pointing to the letters *e* and *i* in order, sometimes dwelling on one element of the sound longer, and sometimes on the other. This was imitated by the children, the teacher still pointing to the letters on the board, and the children looking at the letters.

The word *hut* was then shown and read in the same way. The teacher then pronounced the word distinctly, but emphasized the sound of the *t*, and then asked: “What is the last sound?” The children replied by giving the sound of the *t*. The letter *t* was then written apart and the teacher said, “This sounds *t*,” giving the sound. The word *hut* was then spoken again by the teacher, the sound of *u* in German being much prolonged. The teacher asked, “What sound comes before *t*?” giving the sound of the *t*. The children replied, giving the sound. The *u* was then written apart. The script *u* has a circumflex accent. The teacher asked: “Why do boys wear their caps?” “Because it is cold.” “So,” said the teacher, “the *u* wears his cap and says *u, u, u*, because it is cold.” This little play upon the sound amused the children very much, and when the teacher asked, “What does this sound,” the children gave the sound of *u* with a will.

The letter *h* was treated in the same way, the seeing and sounding being repeated many times.

Both words were then erased, and all the letters were written separately several times about the board. The teacher then pointed to the letters one by one, and asked, “What does this say? and this? and this?” while the children gave the sounds very slowly and distinctly many times. The sounds were very much prolonged whenever they were capable of being continued.

Child after child was called to the board and made to repeat the sounds as she pointed to the letters.

At a little sign of unrest among the children, the teacher suddenly stopped her work and asked : “ Who wishes to learn ? ” All the children put up their hands, with the forefingers raised above, after the manner of many German schools. “ Then,” said the teacher, “ all must look right here,” pointing to the board. “ If any one does not wish to learn she may go home.”

The teacher then called out two children, gave the pointer to one, and asked the other : “ What shall she show you ? ” This child then gave all the sounds of the letters on the board and the other pointed out the letters. Then two more were called out and exercised each other in the same way.

After this had continued some minutes, the teacher again exercised the children in concert. During this concert work the bell struck for luncheon recess. It was nine o'clock ; and they had been in school two hours. Instantly the lesson stopped, the children filed out, and the windows were thrown open for fresh air.

The lesson had occupied nearly an hour. It was given with energy and spirit. The repetitions both of seeing the letters, and of hearing and making the sounds were almost infinite.

Could there be any doubt that the teacher was consciously working to make associations between forms and sounds, so that the sight of the forms would call up the appropriate sounds ; or that she stuck to her purpose ; or that she made good progress toward it ?

CHARACTERISTICS OF GERMAN METHODS.

I could give, with the same minuteness, scores of lessons in religion, object teaching, reading, writing, spelling, grammar, botany, singing ; hand work and gymnastics, that I heard in Prussia, Saxony, Bavaria and Switzerland ; but those already described will illustrate many of the distinguishing characteristics of German methods of teaching, and are, therefore, perhaps, enough for this paper. I spent nearly three months in the common schools of Germany, devoting myself every school day to a study of the question : “ What do the Germans teach in the common schools, and what are their methods of teaching ? ” I may, therefore, read between the lines somewhat in my account of the lessons just described. But I think you

will agree with me in most of the characteristics that I attribute to them.

First of all was manifested great definiteness of purpose. Every lesson was given as though it had special reference to the entire education of the children. It was part of the general plan for developing power, furnishing the mind with knowledge and establishing correct habits of action and feeling. Moreover, it was a part of the work to be done to give the child a comprehensive view of the subject in hand and to establish the habit of logical thinking in this special subject. Its relation to what had preceded it, and to what was to follow, never seemed to be lost to sight. However many points were accidentally introduced, all that was necessary for the logical unfolding of the subject was reviewed, repeated, retained. And then the lesson always had a special purpose. This particular thing was to be understood, facility in doing a definite work was to be attained, a special habit of thinking was to be formed. Hundreds and hundreds of times was I impressed with the fact that a German teacher knew what he was trying to do.

Another peculiarity of most of the lessons that I heard was the tenacity with which the teacher held his class to the matter before them. There was no amusement, no relaxation, no diversion, no rest; but rather one continual pull, one prolonged tug toward the end in view. The teacher rarely joked, the children rarely laughed. No side issues were introduced to make the children generally intelligent. It was enough if they were intelligent on this thing that formed the subject matter of the lesson. In the first lesson that I have described the purpose was to teach concretely the relations of certain numbers to the number eighteen; and in the second to give the pupils the power to write two letters of the German alphabet. And to this special work the teacher devoted herself from the beginning of the hour to the end. There were no diverting applications, no by-play, no wandering. The aim of the lesson never seemed to be lost sight of for a moment.

Another marked peculiarity of German teaching, as I heard it, was the obvious effort of the teacher to make his pupils able to do their work without the aid of others. The least teaching, the least knowledge, must make the child independent.

The old aphorism here found its practical application, — the principal business of the teacher is to make himself useless to his pupils.

This trait was specially observable in the teaching of arithmetic. The teacher taught the addition and subtraction of numbers to ten in such a way as to give the pupils the power of learning the rest of addition by himself. Every number up to and including ten was so taught that each part of the number was the complement of the other part; so that if one part was suggested the other part was instantly thought of by the pupils. But, beyond ten, the pupils first went through a conscious process to obtain the result. Eight and nine were not, at the outset, thought of as seventeen. Eight suggested two as its complement in ten, and two suggested seven as its complement in nine; so that eight and nine were added by resolving nine into two parts, one of which would make ten when added to eight, and the other of which was thought of as added to ten. I have often heard the process stated by a pupil thus: "How many are eight and nine?" "Eight and two are ten and the other seven makes seventeen."

Of course the teaching of addition did not stop at this point; but when the habit of viewing numbers in this way was established, the pupil had the means of learning the rest of his addition without the aid of the teacher. He was henceforth an independent worker. The same method of dealing with subtraction, multiplication and division was almost universally followed. Suppose the question to be, How many are seven times eight? If the pupil does not know, the next question is: How many are six times eight? If this is forgotten the question is, How many are five times eight? Then, how many are forty and eight? Six times eight? Forty-eight and eight? And to this last question the pupil answers mentally, if not aloud: "Forty-eight and two are fifty and six makes fifty-six." Thus there is soon developed the power of recovering independently any lost fact in multiplication. Henceforth the pupil is to do his own thinking. Do you ask whether I think this is a good method? It certainly shifts the burden from the teacher to the pupil; and I think the principle of the development of power by self-activity is correct.

Another example of teaching, so as to make the pupil able

to do his work independently at the earliest practicable moment, was observable in the first lessons in teaching reading. As soon as the children had learned to call a very few words at sight — in some instances not more than two — they were carefully drilled in the analysis of both the written and the spoken words; and each letter was so associated with its proper sound that whenever the children saw the letter the sound was instantly recalled. They were then at once set to work reading words composed of the letters whose sounds they had learned, but combined in new forms. From this time on the children were expected to call the new words without help, whenever they were composed of letters whose sounds they had previously learned.

Again, there was a careful adaptation of the different stages of instruction to the natural order in the exercise of the child's mental faculties. This was well illustrated in the case of arithmetic. Here concrete work always preceded abstract; and in the early stages of instruction the concrete work was carefully graded into two distinct stages, the presentative and the representative. Suppose the ideas of numbers were developed by means of balls that could be moved and grouped upon wires, the balls would be arranged in regularly recurring groups of different colors. By this means the children were able to form distinct images of the groups of balls after the observation had ceased. The same careful provision for distinct representation of numbers was made when the ideas of numbers were developed by means of number charts. On these charts were printed black circles large enough to be seen by the class. In the first stages of instruction these circles were always arranged in the same order, whenever the same number was to be represented. Thus four would be so arranged as to form a square, with two circles above the other two, and five would be represented by means of four circles or dots, arranged in the same way, with another in the middle. When these dots had been studied enough to impress this arrangement upon the minds of the children, the numbers would be recalled by recalling these dots in the order in which they had been seen. I have heard the following and similar dialogues a great many times: —

T. "How does four look?" Ch. "Two points above

and two points below?" T. "How else?" Ch. "Two points at the right and two points at the left." T. "How does five look?" Ch. "Two points above, two points below and one point in the middle." T. "How else." Ch. "Two points at the right, two points at the left and one point in the middle."

Here the order of instruction is first presentation, then representation; first the development of certain ideas of numbers by means of objects, and then the recalling of these ideas by means of stimulating the imagination to create the images of the objects arranged in the same order.

Of course the next stage of instruction would deal with the abstract ideas of numbers. The same careful adaptation of the instruction to the mental powers of the children was everywhere observable.

Another marked trait of the teaching in Germany was the logical questioning that generally prevailed. Among the German teachers questioning is almost reduced to a fine art. Their questions are specific. They go straight to the point. They admit of no vagueness. They are not stated in general terms. Then the answers are required to be equally definite. Too much is as quickly criticised as too little; a wrong order, as an untruth. The pupil is required to follow the rule of the lawyers, "to tell the truth, the whole truth and nothing but the truth."

Suppose the teacher is questioning a class for the purpose of developing a definition. His first question directs attention to the generic quality of the thing to be defined. He next calls for the name of the genus. The next question directs attention to the specific quality of what is to be defined. Then follows the name of the specific quality. Then comes a question so framed as to indicate that the answer is to be the definition required, but an inference from what the pupils have just thought and said. Thus the pupils are taught to observe, to compare, to discriminate, to reason, and to define, all at the same time.

Closely connected with this is the orderly arrangement of the different parts of a lesson. In the first place these parts are rarely wanting in an hour's work with a class: 1st. The restatement of the preceding lesson by the class; 2d. The

questioning of the class by the teacher for the purpose of greater clearness and breadth of view; 3d. The development of the new lesson; 4th. The restatement by the pupils of the points developed by the teacher; 5th. The assignment of home work.

In the second place, there is a regular order in the development of the new lesson. In the lesson in arithmetic that I described, the number to be taught was the next in order after those that the children had learned. The relation of 1 to 17 in forming 18 was first considered; then the relations of 2, 3, 4, etc., to 18 and the numbers below, were taken up in order; and, more than this, the treatment of each number was similar to that of the others.

I remember well how forcibly I was impressed with the orderliness of the work in a lesson in botany in a sixth-year class. Each child had been supplied by the city with one or two specimens of the plants to be studied. The pupils exhibited the books in which they had pressed specimens examined in the class and others collected by themselves; and then described the plants studied at the last lesson.

This done, the new lesson began. The observation of the plants was directed by the teacher at every point. This was the order of the work: — 1. The name. 2. The home: a. Where found; b. Soil. 3. The root: a. Direction of growth; b. Length; c. Form; d. Name. 4. The stem: a. Length; b. Surface, — rough or smooth; c. Shape, — round, oval, or square. 5. The leaves: a. Arrangement, — opposite, alternate, or irregular; b. Form, — round, oval, etc.; c. Venation, — parallel-veined, or net-veined; d. Edges, — notched, lobed, etc.; 6. The flowers: a. Arrangement; b. Calyx, — simple or compound, — lobes; c. Corolla, — kind, number of lobes, shape, color; d. Stamens, — how inserted, number, anthers, etc.; e. Pistils, — number, shape, etc. 7. Fruit: a. Form; b. Parts, etc.

Immediately after the observation of each part of the plant, one or more of the children were required to describe what they had seen; and at the close of the lesson they were required to describe the whole plant, following the exact order of the observation; and finally, as a home lesson, they were required to prepare themselves to describe the plant the next

day. I heard several lessons in the same school — the Royal Augusta School in Berlin — and this order was always observed.

This restatement of the instruction by the pupil is an almost universal practice. Every lesson is a language lesson; and the language lesson is given under these very favorable conditions, — the pupils know something, and they know the order in which it should be expressed. They are then called upon, not merely to talk, but rather to tell known truth. They are then not making sentences, but expressing thoughts.

The last quality of German teaching that I will mention is its power to make the children work. At times the strain upon the children seemed to me severe. This was especially the case in the lower classes. It was not so much that the attention was held too closely, as that it was held too long upon the same subject. As a rule, the pupils are required to study no more at home than our children, and in some cases not so much. But they are obliged to attend closely and think earnestly in school.

This is not all attributable to the teacher; it comes partly from the national spirit. Children in school are to be prepared for citizenship; and this preparation includes the ability to apply one's self to whatever he is called to do. So it comes about that the school, to a greater extent than with us, is a place for training children to habits of close application. Hence amusement, diversion, and mere pleasure find less room in school there than here. But if children and parents both expect the schoolroom to be a place for hard work, it still requires power in the teacher to cause it to be done.

German teachers, then, as I saw them, have a definite purpose, for which they strive incessantly; they labor to make their pupils able to learn independently of teachers; they adapt their instruction to the mental ability of the pupils; their developing questioning is logical; their procedure in their instruction generally, as well as in the separate lessons, is orderly; they secure the reproductions by the pupils of what has been taught; and they develop their pupils by earnest work.

These are not the characteristics of a few teachers only, they are general traits. They are more general than with us. Now, do not misunderstand me. I went to Germany an American, and I returned, if possible, more an American. I never felt so

glad that I was born and reared in this land of freedom and equality as I have for the last four months. Never before did I so fully appreciate the inestimable privilege of making the most of the powers that God has given me, untrammelled by the fetters of birth and caste. The American teacher draws an inspiration from the spirit of our free institutions that is a vitalizing force in every lesson he gives. He is less a thing and more a man because he breathes our air.

SCIENCE OF EDUCATION.

But all this does not prove that we have nothing to learn from the old world. In matters of education we have much to learn. Germany has studied the subject longer than we. Her educational literature is as old in centuries as ours in decades. She has brought to bear upon the subject her profoundest philosophy and her deepest research. For ages her wisest and best men have devoted themselves to the discovery of the principles that govern educational processes, to a clear formulating of the same, and to the best methods of applying them to practice. They have studied the child from the standpoint of natural history, physiology, psychology and religion. They have endeavored to discover the most favorable conditions of food, air, light, heat, exercise and rest, for producing the best human body; and they have tried to learn how to create these conditions.

They have studied the mind still more profoundly. With patient thinking they have striven to ascertain the powers and possibilities of the soul. They have inquired into the order of the development of these powers, and the relation of their development to the self-activities of the soul itself; as well as into the kinds and relative amounts of these activities required to produce the fullest and most harmonious development.

And with equal patience have they studied the means of stimulating the various powers of the soul to healthy action. So that they have examined the different subjects of study in the common schools, not only with reference to the value of the knowledge to be gained from them, but also with reference to their educational values; and by this means they have tried to determine the extent to which each subject is entitled to be studied. Moreover, they have expended an almost infinite

amount of time and thought in analyzing the processes of learning each of these subjects. By these means have they sought with philosophic exactness to adapt the successive stages of instruction in every branch of study in the common schools to the successive stages of development and power in the unfolding minds of the learners.

Nor have they stopped here. They have attempted to ascertain the best instrumentalities to employ, and the best methods of using these instrumentalities, in order to bring the minds of the pupils into the proper relations with things, and the expression of thoughts, so as to secure for the pupils the largest amount of valuable knowledge and training, with the least expenditure of time and labor on the part of the pupils themselves, and of the teachers. The mere comprehension of the amount of work done in Germany, in the attempt to discover the best methods of teaching the common branches of study, would be almost overwhelming to the average American. Works on the application of the principles of education to the practice of teaching, elaborate guides for teachers in the conduct of all branches of instruction, and extensive works on the historical development of the methods of teaching particular subjects, have been multiplied almost without number. And then the exhaustiveness of many of them is something marvellous. Only think of a large octavo volume of four hundred and thirty pages, in fine print, devoted to methods in the first steps in teaching reading! Then the invention of reading machines, and arithmetic machines, arithmetical, botanical, zoological and linguistic charts, — but there is no end to the list of what the Germans have done to make the methods of teaching effective.

Now, is a nation that has the talent, the critical spirit, and the patience to do all this, likely to allow a teacher to take charge of the education of their children when he is in the conditions of their ancestors hundreds of years ago? Will men who have known what educational progress costs, allow teachers to become wise and proficient by repeating the trials, the experiments, and the blunders of ages upon every class that comes under their charge? No, every teacher in Germany must prove his fitness for his calling before he begins his practice. And a part of this fitness is a knowledge of what the world has done towards perfecting the theory and practice of teaching. His

professional education must include a pretty thorough knowledge of the history and science of education, as well as a familiarity with the most approved methods of physical, intellectual and moral training.

I was present at a portion of an examination of candidates for teaching gymnastics. The examination consisted of four parts: 1. The writing of a theme upon the subject by each candidate; and for this they were allowed three hours. 2. An oral examination in the principles and methods of teaching gymnastics. 3. Teaching a set of physical exercises to a class of children in presence of the examiners. 4. Performing a large number of exercises at the dictation of the examiners. If the examinations in all departments are as thorough as this was there can be no doubt but that teachers know their business fairly well before they begin teaching.

Now, in my judgment, those characteristics of German teaching in which they are superior to our own, — and they have superior characteristics, — arise solely from the deeper insight of the Germans into the laws underlying the whole process of education; from their profounder knowledge of educational science. It is taken for granted in Germany that there is a science of education. I should as soon expect to hear a German schoolmaster call in question the existence of a science of mechanics, or of geometry, as to express a doubt in regard to the reality or utility of a science of education; or to indicate any misgivings as to the value of a knowledge of methods of teaching as determined by this science. Nor is this view entertained by teachers alone; it is held by all who direct educational affairs. Accordingly, it would be considered just as absurd to allow a man to become a teacher without a knowledge of education, as it would to license him to be a doctor when ignorant of medicine, or to be a lawyer if he knew nothing of law.

And then this doctrine is wisely applied. Lawyers are thought to be competent to pass upon the legal qualifications of candidates for the law, and doctors are considered quite able to examine in medicine; and then these Germans are so perversely logical as to think that men learned in educational science and practice are better fitted to decide upon the proper qualifications of candidates for the high and sacred office of

teaching, than are blacksmiths, or traders, or even lawyers and doctors.

The result of all this is that the German teacher occupies a high vantage ground when he enters his profession. He has already been put in possession of the wisdom of the ages. The experience of the past has been laid under contribution. All the experiments, all the failures, all the successes, all the trials of all the teachers that have preceded him are but so many facts from which he has made those inductions which are to light his path in the future. Thus he begins, theoretically, and, in large part, practically, upon the most advanced positions occupied by the wisest teachers past and present.

Starting thus he naturally makes some advancement. I was deeply impressed with the provision made by the city of Berlin for the professional study of its teachers. This was a city school museum. It was established in 1876, with an annual appropriation of 4,000 marks. It now contains a pedagogical library of over 6,000 volumes, and a collection of several hundred specimens of apparatus to be used in teaching; and both of these departments are constantly increasing. Connected with it is a hall for teachers' meetings, etc. It is under the charge of an accomplished teacher of the city, and is open to all teachers, without cost, twice a week. I spent one afternoon there; and the number of solid works on the science of education that were taken out was proof of the value of the institution.

Ten or fifteen years ago, that wise educator, our friend Dr. Philbrick, said in a meeting of the Boston masters: "We have done some excellent work, and as a city enjoy a good educational reputation; but then we have made only a single contribution towards educational progress, and that is the idea of a separate desk for each pupil. This is not a reputation that we can afford to feel very proud of. The next thing to which we should devote ourselves is a study of the history and science of education. Our lack here is our weakness."

Our lack here is our weakness still. We, as a nation, have made great progress in this respect within the last twenty years; but we are still far from appreciating the importance of a knowledge of the history, science and methods of teaching. Perhaps no men or women have better talent for teaching than our own; but talent alone is not sufficient to make the best

teachers. All men are still wiser than any man. Empirical methods generally fall short of the best types. Human life is too short to be spent in rediscovering laws and methods. Human souls are too precious to be unnecessarily marred by the unskilful treatment of the unscientific. If, then, we would become leaders in educational progress, — nay, if we would take our places by the side of the best, — our hope lies in a profounder study of educational science.

Boston, Jan. 27, 1886.

AN ABSTRACT

OF THE SCHOOL RETURNS MADE BY THE SCHOOL COM-
MITTEES OF THE SEVERAL TOWNS AND CITIES
IN THE COMMONWEALTH FOR THE
SCHOOL-YEAR 1884-85.

BOARD OF EDUCATION.

BARNSTABLE COUNTY.

TOWNS.	Population—U. S. Cen- sus, 1880.	Valuation — 1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Pub- lic Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attend- ance based upon the average membership.	No. of teachers required by the Public Schools.
Barnstable,	4,242	\$2,869,090	24	620	381	797	3	101	434	642	591	.92	24
Bourne, .	—	959,675	10	223	171	222	—	18	159	199	181	.91	10
Brewster, .	1,144	395,900	7	168	119	206	1	28	119	173	157	.91	7
Chatham, .	2,250	616,923	12	370	225	399	1	69	217	325	298	.92	12
Dennis, .	3,288	1,089,503	14	511	326	586	—	87	356	480	445	.93	14
Eastham, .	692	224,373	3	90	75	120	—	30	75	100	83	.83	3
Falmouth,	2,422	3,444,374	15	327	285	445	1	61	266	351	300	.85	16
Harwich, .	3,265	992,755	16	503	387	629	—	126	386	546	497	.91	16
Mashpee, .	346	126,660	2	52	34	59	—	5	34	54	45	.83	2
Orleans, .	1,294	437,086	6	174	112	177	—	10	112	145	126	.87	6
Provincetown, .	4,346	1,976,563	16	860	565	960	—	131	550	813	782	.96	19
Sandwich,	—	945,500	12	385	238	401	—	64	228	365	340	.93	13
Truro, .	1,017	262,733	6	162	101	203	—	44	93	189	175	.93	6
Wellfleet, .	1,875	886,582	9	275	173	301	—	28	213	282	259	.92	9
Yarmouth,	2,173	1,451,160	10	315	182	336	—	45	244	270	230	.85	10
Totals, .	28,354	\$16,678,877	162	5,035	3,374	5,841	6	847	3,486	4,934	4,509	.91	167

BERKSHIRE COUNTY.

Adams, .	5,591	\$3,060,864	27	1,660	1,053	1,643	4	83	1,033	1,231	1,152	.94	29
Alford, .	348	234,648	3	64	36	67	—	10	36	48	39	.81	3

SCHOOL RETURNS.

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Becket, . . .	1,123	351,868	10	192	111	197	4	25	107	156	131	.84	15
Cheshire, . .	1,537	692,090	9	308	196	345	2	39	197	271	230	.85	10
Clarksburg, .	724	188,543	3	160	95	145	-	5	92	93	84	.90	3
Dalton, . . .	2,052	1,571,373	12	418	282	453	6	29	453	374	343	.92	12
Egremont, . .	875	419,064	3	127	69	131	3	1	68	94	83	.88	4
Florida, . . .	459	157,811	6	124	69	120	7	6	69	103	89	.86	6
Great Barrington, .	4,653	2,787,873	23	840	514	930	9	92	450	837	674	.81	25
Hancock, . . .	642	381,444	6	102	76	136	-	8	86	101	94	.93	7
Hinsdale, . . .	1,595	783,247	12	397	248	404	7	28	251	351	338	.96	12
Lanesborough, . .	1,286	561,431	9	262	167	291	4	22	193	224	191	.85	9
Lee, . . .	3,939	1,898,521	18	790	469	933	11	101	569	763	688	.90	20
Lenox, . . .	2,043	1,450,646	13	449	269	499	2	50	269	319	282	.88	13
Monterey, . . .	635	232,047	6	112	65	122	2	21	64	79	69	.87	7
Mt. Washington, .	205	78,948	2	28	20	26	1	2	20	20	16	.80	2
New Ashford, . .	203	84,700	2	33	22	35	-	8	22	23	21	.91	3
New Marlboro', .	1,876	628,007	14	331	235	391	5	53	244	299	258	.86	13
North Adams, . .	10,191	4,956,630	42	2,765	1,680	2,875	3	107	1,374	1,906	1,745	.92	55
Otis, . . .	785	214,232	8	125	92	168	6	10	109	143	119	.83	8
Peru, . . .	403	120,736	5	65	37	68	-	3	39	52	44	.85	5
Pittsfield, . . .	13,364	8,491,050	47	2,870	1,705	3,017	22	212	1,711	2,413	2,176	.90	68
Richmond, . . .	1,124	488,659	7	247	139	212	2	12	124	156	133	.85	7
Sandisfield, . .	1,107	395,812	12	206	147	238	4	30	145	179	155	.87	12
Savoy, . . .	715	190,183	9	108	75	122	5	16	75	108	92	.85	9
Sheffield, . . .	2,204	914,535	14	409	409	503	9	76	291	338	283	.83	14
Stockbridge, . . .	2,357	2,334,370	9	323	293	353	2	23	224	308	278	.90	10
Tyringham, . . .	542	236,168	5	92	61	104	1	7	61	98	80	.82	5
Washington, . . .	493	207,522	6	76	63	99	2	13	60	64	59	.83	6
West Stockbridge, .	1,923	731,384	11	361	206	479	4	46	267	383	333	.87	12
Williamstown, . .	3,394	1,671,516	12	656	401	682	3	51	400	383	337	.88	20
Windsor, . . .	644	216,421	8	76	75	127	8	11	72	103	91	.88	8
Totals, . . .	69,032	\$36,732,343	373	14,776	9,379	15,915	138	1,200	9,175	12,020	10,707	.89	432

BOARD OF EDUCATION.

BARNSTABLE COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.		Whole No. of different female teachers in school-year.		No. of teachers who have attended Normal Schools.		No. of teachers who have graduated from Normal Schools.		Av'ge wages per month of male teachers in Public Schools.		Av'ge wages per month of female teachers in Public Schools.		Aggregate of months all the Public Schools have been kept during the school-year.		Average No. of months the Public Schools have been kept for the entire year.		No. of Schools kept less than six months each.		HIGH SCHOOLS.						Salary of Principal.
	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school-year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Av'ge wages per month of male teachers in Public Schools.	Av'ge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length.											
														Months.	Days.										
Barnstable, .	8	20	9	9	\$72 87	\$37 36	201-10	8-8	1	1	1	47	Taxation,	9	\$900 00										
Bourne, .	3	14	1	1	53 00	33 00	80	8	1	1	1	1	-	-	-										
Brewster, .	2	6	1	1	50 00	37 50	49-10	7-10	1	1	1	1	-	-	-										
Chatham, .	2	10	1	1	77 50	24 20	99-5	8-5	1	1	1	30	Taxation,	9	900 00										
Dennis, .	6	14	5	4	57 50	32 37	107-15	7-14	1	1	1	48	Taxation,	9	520 00										
Eastham, .	3	3	1	1	36 12	32 83	25-10	8-10	1	1	1	1	-	-	-										
Falmouth, .	5	14	6	3	53 44	39 00	134-15	9	1	1	2	35	Part tax,	9	1,350 00										
Harwich, .	4	12	3	1	52 00	31 50	122-10	7-15	1	1	1	43	Taxation,	9	900 00										
Mashpee, .	2	-	1	1	22 32	-	13-10	6-15	1	1	1	1	-	-	-										
Orleans, .	1	6	1	1	88 88	29 00	54	9	1	1	1	41	Taxation,	9	800 00										
Provincetown, .	3	16	2	2	87 00	30 62	144-10	9-10	1	1	1	115	Taxation,	9-10	1,000 00										
Sandwich, .	4	16	2	1	87 50	32 28	98	8-3	1	1	2	45	Taxation,	10	1,000 00										
Truro, .	3	7	4	1	54 33	33 28	48-10	8-2	1	1	1	1	-	-	-										
Wellfleet, .	2	10	-	3	90 00	33 00	78	8-3	1	1	1	57	Taxation,	10	900 00										
Yarmouth, .	5	8	4	3	72 84	30 98	89	8-9	1	1	1	29	Part tax,	9	900 00										
Totals, .	53	156	40	27	\$63 72	\$32 97	1,346-5	8-6	3	10	14	490	-	-	92-10	\$9,170 00									

BERKSHIRE COUNTY — CONTINUED.

Adams, .	7	27	7	5	5	\$86 33	\$37 29	242-5	9	-	1	3	73	Taxation,	9.15	\$1,500 00
Alford, .	3	3	1	1	1	29 00	24 00	25-5	8-8	-	-	-	-	-	-	-

SCHOOL RETURNS.

V

Becket,	1	14	3	1	28 00	20 00	57	5-14	1	-	1	-	67	-	Taxation,	-	8-10	-	600 00
Cheshire,	2	8	2	2	46 33	24 00	76-10	8-10	-	-	1	-	-	-	-	-	-	-	-
Clarksburg,	-	4	-	-	-	28 97	25-10	8-10	-	-	-	-	-	-	-	-	-	-	-
Dalton,	1	12	3	2	86 48	32 00	111	9-5	-	-	-	-	-	-	-	-	-	-	-
Egremont,	2	4	2	-	36 00	32 00	25-17	8-15	-	-	-	-	-	-	-	-	-	-	-
Florida,	1	5	-	-	34 00	22 13	35-19	6	-	-	-	-	-	-	-	-	-	-	-
Great Barrington,	4	28	1	1	86 35	29 00	218	9-9	-	-	1	-	112	-	Taxation,	9-10	1,550 00	-	-
Hancock,	-	11	2	1	-	23 00	52	8-13	-	-	1	-	-	-	-	-	-	-	-
Hinsdale,	1	15	3	2	30 00	29 00	99-5	8-7	-	-	1	-	34	-	Taxation,	6-5	600 00	-	-
Lanesborough,	-	11	-	-	-	25 08	68-4	7-11	-	-	-	-	-	-	-	-	-	-	-
Lee,	5	20	-	-	70 80	30 37	163-12	9-2	-	-	2	-	96	-	Taxation,	10	1,500 00	-	-
Lenox,	4	11	3	2	44 00	28 00	108	8-3	2	1	1	-	26	-	Taxation,	7-11	302 00	-	-
Monterey,	1	9	1	-	20 00	20 60	46	7-13	-	-	-	-	50	-	Taxation,	10	800 00	-	-
Mt. Washington,	2	2	-	-	24 00	20 00	16-5	8-3	-	-	-	-	-	-	-	-	-	-	-
New Ashford,	-	3	-	-	-	22 00	14	7	-	-	-	-	-	-	-	-	-	-	-
New Marlboro',	4	18	1	-	25 16	22 00	100-15	7-15	-	-	-	-	-	-	-	-	-	-	-
North Adams,	6	59	2	1	104 78	35 58	351-5	9-16	-	1	1	-	83	-	Taxation,	9-15	1,500 00	-	-
Otis,	2	10	1	-	20 00	20 60	45	6	1	-	-	-	-	-	-	-	-	-	-
Peru,	-	7	1	-	-	19 00	30	6	-	-	-	-	-	-	-	-	-	-	-
Pittsfield,	6	80	9	7	73 00	33 25	463	9-17	-	1	1	-	149	-	Taxation,	10	1,800 00	-	-
Richmond,	2	10	-	-	24 00	24 00	59-10	8-10	-	-	-	-	-	-	-	-	-	-	-
Sandisfield,	2	16	-	-	29 00	21 46	85-10	7-3	-	-	-	-	-	-	-	-	-	-	-
Savoy,	1	14	-	-	24 00	18 53	54	6	-	-	-	-	-	-	-	-	-	-	-
Sheffield,	6	14	1	-	34 79	25 00	116-5	8-6	-	-	1	-	37	-	Taxation,	9	618 00	-	-
Stockbridge,	3	10	1	1	80 00	32 00	87-15	9-15	-	1	1	-	76	-	Taxation,	9-15	1,200 00	-	-
Tyringham,	-	7	2	-	-	22 80	37-10	7-4	-	-	-	-	-	-	-	-	-	-	-
Washington,	-	6	-	-	-	128 83	35-10	6-10	1	-	-	-	-	-	-	-	-	-	-
West Stockbridge,	3	11	2	2	46 23	27 72	109-10	9-19	-	-	-	-	-	-	-	-	-	-	-
Williamstown,	2	18	2	-	36 00	32 00	100-12	8-8	2	1	1	-	31	-	Taxation,	10	400 00	-	-
Windsor,	1	12	-	-	20 00	19 25	48	6	-	-	-	-	-	-	-	-	-	-	-
Totals, .	72	479	50	28	\$55 48	\$29 90	3,108-14	8 7	7	12	25	-	834	-	-	117-1	\$12,370 00	-	-

BOARD OF EDUCATION.

BARNSTABLE COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of Printing reports, etc.	Expense of sundries, — books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Barnstable,	\$11,000 00	\$135 00	\$335 69	\$103 00	\$799 31	-	\$728 40	\$918 56	\$14,019 96	-
Bourne, .	3,350 00	-	150 00	15 00	464 45	-	266 32	-	4,245 77	-
Brewster,	2,200 00	100 00	-	16 00	-	-	-	-	2,316 00	-
Chatham,	3,300 00	168 00	-	20 00	137 50	-	100 00	500 00	4,225 50	-
Dennis, .	5,000 00	60 00	75 00	25 00	563 83	-	177 26	258 89	6,159 98	-
Eastham,	800 00	-	65 00	10 00	-	-	-	60 21	935 21	-
Falmouth,	6,600 00	185 00	1,000 00	30 00	1,094 24	-	-	384 20	9,293 44	-
Harwich, .	5,000 00	110 00	-	30 00	778 40	-	-	297 00	6,215 40	-
Mashpee, .	500 00	30 00	-	10 00	-	-	9 00	-	549 00	-
Orleans, .	2,200 00	-	105 00	20 30	124 93	-	66 09	432 31	2,948 63	-
Provincetown, .	7,800 00	350 00	-	25 00	611 39	\$1,000 00	-	415 35	10,201 74	-
Sandwich,	5,100 00	-	175 00	45 00	494 19	-	-	106 52	5,920 71	-
Truro, .	1,500 00	30 86	80 00	23 00	329 48	-	1,101 10	81 78	3,154 22	-
Wellfleet, .	4,000 00	175 00	-	10 00	237 82	-	-	216 09	4,638 91	-
Yarmouth,	3,500 00	105 00	-	16 00	721 14	-	-	228 78	4,570 92	-
Totals,	\$61,850 00	\$1,448 86	\$1,985 69	\$398 30	\$6,356 68	\$1,000 00	\$2,448 17	\$3,899 69	\$79,395 39	-

BERKSHIRE COUNTY — CONTINUED.

Adams, .	\$12,995 47	\$150 00	\$800 00	\$24 80	\$2,440 30	-	\$800 00	\$924 24	\$18,134 81	-
Alford, .	419 36	15 00	-	8 00	-	-	-	-	442 36	-

SCHOOL RETURNS.

vii

Becket,	1,034 89	50 03	-	5 78	380 81	-	624 62	14 55	2,110 68	-
Cheshire,	2,500 00	67 50	-	10 00	406 39	-	410 63	13 50	3,408 02	-
Clarksburg,	700 00	2 00	-	17 00	196 71	-	-	25 00	940 71	-
Dalton,	4,743 62	120 00	-	12 00	494 75	-	477 06	215 10	6,062 53	-
Egremont,	800 00	40 00	-	14 00	75 00	-	-	15 00	944 00	-
Florida,	800 00	25 00	-	-	90 00	\$1,675 00	10 00	18 00	2,618 00	-
Gt. Barrington,	8,500 00	223 50	-	35 00	1,568 61	-	446 43	102 48	10,876 02	-
Hancock,	800 00	59 00	-	7 00	201 15	-	248 10	-	1,315 00	\$25 00
Hinsdale,	3,000 00	75 00	-	12 00	655 00	-	-	300 48	4,042 48	-
Lanesborough,	1,700 00	58 33	-	10 00	290 74	-	97 50	26 09	2,182 66	-
Lee,	8,473 08	334 50	-	15 00	749 33	-	100 00	185 59	9,857 50	96 00
Lenox,	4,100 00	113 00	-	15 00	616 08	1,400 00	714 55	300 00	7,258 63	-
Monterey,	800 00	55 75	-	7 00	131 00	-	250 00	11 12	1,254 87	-
Mt. Washington	200 00	15 00	-	5 00	10 77	-	-	-	230 77	-
New Ashford,	99 00	10 00	-	5 00	-	-	-	10 00	124 00	-
New Marlboro',	2,000 00	130 95	-	25 00	224 77	-	435 65	121 40	2,937 77	-
North Adams,	19,361 32	250 00	1,700 00	150 00	7,753 64	-	3,928 93	1,588 28	34,732 17	-
Otis,	1,000 00	58 50	-	8 00	25 34	-	62 00	12 60	1,166 44	-
Peru,	600 00	39 00	-	6 25	-	-	-	33 45	678 70	-
Pittsfield,	31,000 00	-	1,550 00	90 00	1,635 00	51,644 71	1,347 15	829 78	88,096 64	-
Richmond,	1,300 00	50 00	-	11 40	212 43	954 41	76 41	70 63	2,675 28	-
Sandisfield,	2,000 00	89 00	-	7 00	202 06	-	-	414 38	2,712 44	-
Savoy,	486 00	65 00	-	10 00	75 00	421 30	25 00	1 32	1,083 62	50 00
Sheffield,	3,700 00	183 50	-	25 00	557 82	-	-	50 00	4,516 32	-
Stockbridge,	5,000 00	220 00	-	30 00	700 00	-	-	475 00	6,425 00	-
Tyringham,	700 00	20 00	-	6 00	162 40	-	-	119 95	1,008 35	-
Washington,	516 10	33 96	-	5 00	129 15	387 11	-	3 75	1,075 07	-
W. Stockbridge,	4,314 77	74 50	-	6 00	664 35	-	-	54 35	5,113 97	-
Williamstown,	5,200 00	110 00	-	36 40	870 69	-	-	386 67	6,603 76	-
Windsor,	800 00	38 75	-	6 00	255 86	-	-	1 10	1,101 71	-
Totals,	\$129,643 61	\$2,776 77	\$4,050 00	\$624 63	\$21,775 15	\$56,482 53	\$10,054 03	\$6,323 81	\$231,730 28	\$171 00

SCHOOL RETURNS.

ix

Becket, .	-	-	-	-	1	45	\$150 00	310 27	-
Cheshire, .	-	77 50	-	-	-	-	-	221 59	-
Clarksburg, .	-	37 10	-	-	-	-	-	309 56	-
Dalton, .	-	-	-	-	-	-	-	177 31	-
Egremont, .	-	40 07	-	-	-	-	-	309 17	-
Florida, .	-	-	-	-	-	-	-	306 50	-
Great Barrington, .	-	257 02	-	-	3	35	14,000 00	203 32	74 00
Hancock, .	\$200 00	\$12 00	-	-	-	-	-	307 15	50 00
Hinsdale, .	247 00	14 82	-	-	-	-	-	223 53	-
Lanesborough, .	775 00	48 07	-	-	-	-	-	217 95	-
Lee, .	1,608 33	89 24	-	-	1	5	15 00	210 08	-
Lenox, .	-	-	15	-	1	30	200 00	178 61	50 00
Monterey, .	612 01	36 72	-	-	-	-	-	307 35	-
Mt. Washington, .	100 00	6 00	-	-	-	-	-	302 09	-
New Ashford, .	-	-	-	-	-	-	-	302 15	12 00
New Marlboro', .	5,458 66	327 52	30	-	-	-	-	227 70	11 25
North Adams, .	-	-	-	-	1	60	540 00	176 86	-
Otis, .	-	47 69	-	-	2	20	20 00	309 82	-
Peru, .	370 00	18 21	-	-	-	-	-	303 51	-
Pittsfield, .	-	-	-	-	3	110	6,000 00	194 74	194 74
Richmond, .	-	-	-	-	-	-	-	317 49	-
Sandisfield, .	1,290 00	29 47	-	-	-	-	-	312 81	-
Savoy, .	1,297 00	49 01	-	-	-	-	-	307 87	-
Sheffield, .	1,600 00	247 73	-	-	1	5	90 00	229 13	-
Stockbridge, .	4,000 00	407 81	-	-	2	15	100 00	174 84	-
Tyringham, .	-	33 78	-	-	-	-	-	305 92	-
Washington, .	-	40 07	-	-	-	-	-	305 72	-
West Stockbridge, .	-	-	-	-	-	-	-	226 40	-
Williamstown, .	-	-	-	-	2	69	3,365 00	191 35	47 82
Windsor, .	200 00	74 74	-	-	-	-	-	306 83	-
Totals, .	\$17,758 00	\$1,255 37	45	2	17	394	\$24,480 00	\$8,336 92	\$439 81

BOARD OF EDUCATION.

BRISTOL COUNTY.

TOWNS.	Population—U. S. Census, 1880.	Valuation—1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attendance based upon the average membership.	No. of teachers required by the Public Schools.
Acushnet, .	1,105	\$633,550	6	191	103	181	1	24	109	152	132	.87	6
Attleborough, .	11,111	5,661,828	43	2,231	1,234	2,567	2	127	1,608	1,969	1,738	.88	50
Berkley, .	927	410,974	7	156	103	170	7	15	88	130	117	.90	7
Dartmouth, .	3,430	1,892,850	20	578	305	514	22	22	297	416	354	.85	20
Dighton, .	1,791	719,275	10	302	192	340	3	28	222	267	231	.87	10
Easton, .	3,902	3,388,102	21	800	511	936	2	88	527	729	629	.86	28
Fairhaven, .	2,875	1,401,575	10	446	295	633	-	47	242	415	375	.90	13
Fall River, .	48,961	44,286,677	157	11,767	6,415	10,430	-	441	6,583	7,696	6,918	.90	213
Freetown, .	1,329	*829,975	7	228	139	281	4	21	184	211	170	.80	8
Mansfield, .	2,765	1,120,449	13	462	274	518	5	24	294	443	396	.89	13
New Bedford, .	26,845	31,354,082	113	5,131	3,923	4,740	-	295	3,411	4,121	3,853	.93	118
Norton, .	1,732	756,075	8	308	220	311	4	23	220	240	211	.87	9
Raynham, .	1,681	855,428	10	270	164	273	2	12	157	228	210	.92	10
Rehoboth, .	1,891	735,655	15	275	172	316	7	33	170	245	213	.88	15
Seekonk, .	1,227	712,710	7	227	159	245	4	14	159	184	164	.89	7
Somerset, .	2,006	1,080,333	11	473	275	538	3	36	293	418	374	.89	17
Swansea, .	1,355	704,975	10	226	154	257	4	27	154	196	164	.84	10
Taunton, .	21,213	16,353,738	69	3,892	2,387	4,045	-	187	2,658	3,204	3,009	.91	84
Westport, .	2,894	1,347,775	21	497	319	588	15	66	324	460	377	.85	21
Totals, .	139,040	\$114,246,026	558	28,460	17,344	27,783	85	1,530	17,700	21,724	19,635	.90	659

DUKES COUNTY.

Chilmark, .	494	\$216,064	3	56	26	66	1	19	44	51	47	.92	3
Cottage City, .	672	1,354,800	3	98	55	150	-	15	54	109	96	.88	4
Edgartown, .	1,303	771,019	6	147	90	173	-	23	42	146	131	.90	7
Gay Head, .	161	19,301	1	22	9	18	2	1	9	15	12	.80	2
Gosnold, .	152	194,403	1	21	11	20	-	4	7	12	10	.83	1
Tisbury, .	1,518	680,335	9	200	154	228	1	34	150	180	160	.89	9
Totals, .	4,300	\$3,235,922	23	544	345	655	4	96	306	513	456	.89	26

BRISTOL COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school-year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Av'ge wages per month of male teachers in Public Schools.	Av'ge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	HIGH SCHOOLS.		Salary of Principal.
														Months.	Length.	
Acushnet, .	-	9	4	3	-	\$32 61	54	9	-	1	1	-	-	-	-	-
Attleborough, .	7	63	20	17	\$80 00	41 85	406-15	9-5	-	2	4	103	Taxation,	9-10	9-10	{ \$1,100 00 1,100 00
Berkley, .	1	9	3	1	24 00	26 80	57-15	8-5	-	-	-	-	-	-	9	600 00
Dartmouth, .	8	22	1	5	34 00	23 50	179-10	8-19	-	1	1	35	Taxation,	-	-	-
Dighton, .	1	14	9	7	48 00	34 68	82	8-5	-	-	-	-	-	-	-	-
Easton, .	2	26	10	7	150 00	40 00	200	9-15	-	1	2	90	In part,	9-15	9-15	1,500 00
Fairhaven, .	3	15	10	6	76 67	35 00	94-10	9-9	-	1	2	70	Taxation,	10	10	1,000 00
Fall River, .	10	203	20	18	140 00	46 35	1,530	9-15	8	1	9	442	Taxation,	10	10	2,200 00
Freetown, .	1	11	5	3	32 00	29 75	62-4	8-5	-	-	-	-	-	-	-	-
Mansfield, .	3	14	5	3	70 00	31 00	111-15	8-15	-	1	1	42	Taxation,	9-15	9-15	850 00
New Bedford, .	7	111	31	31	159 28	49 70	1,130	10	-	1	11	284	Taxation,	10	10	1,900 00
Norton, .	2	9	3	2	36 48	33 70	64	8	-	-	-	-	-	-	-	-
Raynham, .	-	14	7	6	-	33 73	78-9	7-17	-	-	-	-	-	-	-	-
Rehoboth, .	1	18	3	2	32 00	29 97	100	6-13	1	-	-	-	-	-	-	-
Seekonk, .	-	11	5	5	-	31 00	56	8	-	-	-	-	-	-	-	-
Somerset, .	4	13	6	6	48 00	34 53	90	8-3	-	1	1	25	Taxation,	10	10	800 00
Swansea, .	1	12	5	3	26 00	28 20	80	8	-	-	-	-	-	-	-	-
Taunton, .	10	74	15	14	96 33	47 37	690	10	-	1	4	174	Taxation,	10	10	1,700 00
Westport, .	3	26	1	-	38 33	24 00	179	9	1	1	1	43	Taxation,	9	9	450 00
Totals, .	64	674	163	134	\$87 38	\$14 51	5,245-18	165-6	10	11	36	1,308	-	97	97	\$13,200 00

DUKES COUNTY — CONTINUED.

Chilmark, .	1	3	-	-	\$28 00	\$28 00	21	7	-	-	-	-	-	-	-	-	-
Cottage City, .	1	3	1	1	60 00	26 88	23-4	8-1	-	-	-	-	-	-	-	-	-
Edgartown, .	2	6	-	-	50 00	28 40	44	7-7	-	-	1	29	-	-	8	-	\$480 00
Gay Head, .	1	1	-	-	33 33	16 67	6	6	-	-	-	-	-	-	-	-	-
Gosnold, .	-	3	1	-	-	29 33	9	9	-	-	-	-	-	-	-	-	-
Tisbury, .	2	7	5	5	40 00	24 55	63-5	7	-	-	-	-	-	-	-	-	-
Totals, .	7	23	7	6	\$43 05	\$26 59	166-9	44-8	-	1	1	29	-	-	8	-	\$480 00

BOARD OF EDUCATION.

BRISTOL COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of Printing reports, etc.	Expense of sundries, books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Acushnet,	\$1,700 00	\$80 00	-	\$6 00	\$438 25	-	-	\$107 54	\$2,331 79	-
Attleborough,	27,900 00	-	\$1,171 67	12 00	4,032 26	\$21,658 22	\$2,925 48	1,416 30	59,115 93	-
Berkley,	1,500 00	77 00	-	12 00	138 48	-	-	15 00	1,742 48	-
Dartmouth,	4,500 00	168 00	-	34 00	631 29	-	-	84 83	5,418 12	\$25 00
Dighton,	2,800 00	-	97 75	14 25	512 30	-	-	85 10	3,509 30	-
Easton,	8,532 00	132 00	-	45 00	763 84	-	-	297 35	9,770 99	-
Fairhaven,	5,500 00	256 50	-	15 00	906 82	-	463 90	-	7,142 22	-
Fall River,	120,907 04	-	2,400 00	174 72	8,540 94	35,830 87	-	12,557 35	180,410 92	-
Freetown,	2,000 00	75 60	-	15 00	380 00	550 00	250 00	125 00	3,395 00	-
Mansfield,	5,500 00	147 00	-	31 75	739 00	-	-	287 94	6,705 69	-
New Bedford,	77,887 75	900 00	2,000 00	120 00	8,000 00	8,103 37	4,000 00	3,471 00	104,482 12	-
Norton,	2,000 00	-	125 00	22 00	425 22	-	500 00	156 29	3,228 51	-
Raynham,	3,000 00	16 00	150 00	15 00	600 04	-	-	24 00	3,805 04	-
Rehoboth,	3,200 00	97 00	-	22 80	430 00	-	104 00	50 00	3,903 80	-
Seekonk,	1,700 00	94 00	-	10 00	419 70	-	418 46	48 44	2,690 60	-
Somerset,	3,851 96	153 69	-	28 00	749 43	-	-	304 42	5,087 50	-
Swansea,	2,500 00	-	105 00	20 00	302 72	1,143 46	113 82	15 55	4,205 55	69 00
Taunton,	46,800 00	375 00	1,900 00	143 00	5,289 86	49,277 40	1,500 00	2,500 00	107,785 26	-
Westport,	4,000 00	185 00	-	35 00	834 39	1,043 97	220 00	414 00	6,732 36	-
Totals,	\$325,778 75	\$2,756 19	\$7,949 42	\$775 52	\$34,134 54	\$117,607 29	\$10,495 66	\$21,960 01	\$521,463 18	\$94 00

DUKES COUNTY — CONTINUED

Chilmark, .	\$450 00	\$42 00	-	\$10 00	\$75 22	-	-	\$72 51	\$649 73	-
Cottage City, .	1,250 00	75 00	-	25 00	217 87	-	-	79 96	1,647 83	-
Edgartown, .	1,700 00	50 00	-	30 00	361 49	-	-	53 73	2,195 22	-
Gay Head, .	70 00	13 00	\$2 00	5 00	6 00	-	-	6 50	102 50	-
Gosnold, .	240 00	30 00	-	2 50	25 00	-	-	6 23	304 25	-
Tisbury, .	2,000 00	75 00	-	13 00	413 00	\$1,113 45	\$100 00	-	3,714 45	-
Totals, .	\$5,710 00	\$285 00	\$2 00	\$85 50	\$1,098 58	\$1,113 45	\$100 00	\$218 93	\$8,613 98	-

BRISTOL COUNTY — CONCLUDED.

TOWNS.	Amount of local funds the income of which can be appropriated only for the support of Schools and Acad- emies.	Income of local funds.	Income of surplus rev- enue and other funds, including the dog tax, used at the option of the town.	ACADEMIES AND PRIVATE SCHOOLS.						Town's share of school fund payable Jan. 25, 1885.	How much of said fund was used for appa- ratus and books of reference.
				No. of Academies.	Whole No. at- tending for the year.	Amount of tu- tion paid.	No. of Private Schools.	Whole No. at- tending for the year.	Estimated amt't of tuition.		
Acushnet, .	-	-	\$116 48	-	-	-	-	-	-	\$212 61	-
Attleborough, .	\$2,800 00	\$115 00	812 57	-	-	-	3	70	\$857 00	13 13	-
Berkley, .	-	-	-	-	-	-	-	-	-	309 04	-
Dartmouth, .	2,000 00	90 99	258 84	-	-	-	-	-	-	183 29	-
Dighton, .	-	-	155 83	-	-	-	-	-	-	218 47	-
Easton, .	100,000 00	7,500 00	386 70	-	-	-	-	-	-	51 37	-
Fairhaven, .	-	-	302 32	-	-	-	2	25	300 00	182 06	-
Fall River, .	-	-	-	-	-	-	5	1,000	9,000 00	-	-
Freetown, .	-	-	183 26	-	-	-	-	-	-	216 78	\$41 30
Mansfield, .	1,000 00	56 00	-	-	-	-	-	-	-	179 19	-
New Bedford, .	50,000 00	3,000 00	694 46	1	63	\$6,350 00	25	850	3,900 00	-	-
Norton, .	-	-	214 32	1	120	7,000 00	1	15	300 00	220 29	-
Raynham, .	-	-	222 08	-	-	-	-	-	-	217 17	-
Rehoboth, .	-	-	264 98	-	-	-	-	-	-	217 49	-
Seekonk, .	-	-	195 16	-	-	-	-	-	-	214 04	-
Somerset, .	-	-	260 48	-	-	-	1	25	40 00	180 75	25 00
Swansea, .	-	-	-	-	-	-	-	-	-	213 46	53 36
Taunton, .	8,000 00	650 00	46 61	1	114	\$4,000 00	1	17	300 00	-	-
Westport, .	-	-	250 04	-	-	-	-	-	-	180 82	-
Totals, .	\$163,800 00	\$11,411 99	\$4,364 13	3	297	\$17,350 00	38	2,002	\$14,697 00	\$3,009 96	\$119 66

DUKES COUNTY — CONCLUDED.

Chilmark, .	-	-	-	-	-	-	-	\$304 09	-	-
Cottage City, .	-	-	-	-	-	-	-	155 92	\$36 25	-
Edgartown, .	-	-	-	-	-	-	-	210 79	-	-
Gay Head, .	-	-	-	-	-	-	-	301 50	-	-
Gosnold, .	-	-	-	-	-	-	-	301 30	-	-
Tisbury, .	\$5,000 00	\$200 00	-	59 93	1	25	\$125 00	213 85	-	-
Totals, .	\$5,000 00	\$200 00	-	\$111 30	1	25	\$125 00	\$1,487 45	\$36 25	-

ESSEX COUNTY.

TOWNS.	Population—U. S. Cen- sus, 1880.	Valuation — 1881.	No. of Public Schools.	No. of persons in town May 1, 1881, between 5 and 15 years of age.	No. of persons in town May 1, 1881, between 8 and 14 years of age.	No. of different pupils of all ages in the Pub- lic Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attend- ance based upon the average membership.	No. of teachers required by the Public Schools.
Amesbury,	3,355	\$1,507,852	20	573	382	673	2	45	499	640	626	.98	21
Andover, .	5,169	3,698,616	22	882	574	848	7	21	543	722	661	.92	24
Beverly, .	8,456	9,845,175	35	1,513	895	1,475	-	70	866	1,406	1,144	.81	38
Boxford, .	824	642,520	6	137	82	139	1	10	68	119	106	.89	6
Bradford, .	2,643	1,295,091	10	487	292	594	-	47	354	485	429	.88	12
Danvers, .	6,598	3,569,920	20	1,069	633	1,159	3	70	710	1,026	932	.90	24
Essex, .	1,670	825,698	9	285	134	271	5	45	134	233	218	.94	9
Georgetown,	2,231	1,078,423	10	380	210	440	-	15	200	435	405	.93	10
Gloucester,	19,329	11,376,812	80	4,028	2,567	4,287	18	265	2,400	3,609	3,395	.94	97
Groveland,	2,227	847,994	10	394	274	418	-	7	178	332	284	.86	10
Hamilton, .	935	620,290	4	110	74	115	4	4	74	91	76	.84	4
Haverhill, .	18,472	14,293,932	75	3,569	2,110	3,660	19	259	1,780	3,197	2,552	.80	98
Ipswich, .	3,699	1,961,545	16	651	430	710	4	60	430	568	516	.96	19
Lawrence, .	39,151	27,369,095	104	7,177	4,252	6,109	33	301	3,783	4,705	4,485	.95	129
Lynn, .	38,274	27,548,581	116	7,087	4,321	6,247	-	461	3,709	5,962	5,403	.91	133
Lynnfield,	686	550,467	3	120	66	128	4	9	66	105	93	.89	3
Manchester,	1,640	4,593,889	7	251	169	277	-	19	162	232	209	.90	7
Marblehead,	7,467	4,354,500	15	1,371	822	1,405	-	97	810	1,236	1,091	.88	27
Merimac, .	2,237	1,138,004	14	433	250	323	3	27	236	386	358	.93	16
Methuen, .	4,392	2,650,067	19	767	429	840	7	61	571	676	599	.89	21
Middleton,	1,000	529,809	4	134	86	153	1	13	85	128	97	.76	4
Nahant, .	808	4,633,186	4	140	76	148	-	13	75	129	112	.95	6
Newbury, .	1,566	856,311	7	283	188	267	1	10	184	218	189	.86	7

SCHOOL RETURNS.

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Newburyport, .	13,538	7,548,521	29	2,687	1,677	1,836	-	55	1,144	1,861	1,181	.63	42
North Andover, .	3,217	2,156,447	16	702	413	696	3	36	390	588	526	.89	20
Peabody, .	9,028	6,671,200	33	1,913	1,089	2,009	-	118	1,126	1,696	1,442	.85	39
Rockport, .	3,912	2,000,568	14	802	539	845	-	86	447	750	686	.91	20
Rowley, .	1,201	518,578	7	226	150	226	6	3	138	185	159	.86	7
Salem, .	27,563	25,336,972	84	5,212	3,042	3,777	-	330	2,154	3,455	3,022	.87	93
Salisbury, .	4,079	2,304,733	21	828	540	867	6	61	538	712	630	.88	22
Saugus, .	2,625	1,378,692	13	500	308	558	2	42	340	439	407	.93	14
Swampscott, .	2,500	3,506,825	10	386	241	404	-	33	267	381	339	.89	12
Topsfield, .	1,165	723,930	5	176	130	160	4	14	107	139	119	.86	5
Wenham, .	889	506,025	5	134	102	151	6	9	102	121	107	.88	5
West Newbury, .	1,989	1,024,108	11	301	218	314	2	27	204	273	230	.84	11
Totals, .	244,535	\$179,464,405	858	45,708	27,765	42,529	141	2,743	24,874	37,240	32,828	.88	1,015

SCHOOL RETURNS.

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Newburyport, .	6	38	3	2	110 00	37 77	291-9	10-2	-	1	4	90	Taxation, 10	1,500 00
North Andover, .	5	18	2	-	78 00	39 33	152-15	9-11	-	1	2	44	Taxation, 10	1,015 00
Peabody, .	4	38	17	14	120 00	41 60	330	10	-	1	3	112	Taxation, 10	1,400 00
Rockport, .	3	19	4	3	54 00	31 17	117	8-7	1	1	2	41	Taxation, 9	650 00
Rowley, .	1	7	-	-	48 00	23 57	63	9	-	-	-	-	-	-
Salem, .	7	86	64	59	164 30	53 43	833-4	9-19	-	1	8	185	Taxation, 9	2,200 00
Salisbury, .	4	25	2	1	83 95	30 00	169-10	8-2	-	1	2	49	Taxation, 9-5	1,200 00
Saugus, .	1	13	8	7	84 00	35 00	121-18	9-8	-	1	2	55	Taxation, 9-12	798 00
Swampscott, .	1	12	10	9	112 00	43 00	100	10	-	1	2	22	Taxation, 10	1,120 00
Topsfield, .	1	6	4	2	60 00	34 00	40	8	-	-	-	-	-	-
Wenham, .	-	7	2	3	-	33 86	44-10	8-18	-	-	-	49	-	-
West Newbury, .	3	9	-	-	63 68	28 55	83	7-11	-	1	1	-	Taxation, 8	634 37
Totals, .	99	1,003	346	278	\$113 11	\$43 30	8,098-13	9-9	4	26	86	2,441	-	\$33,397 64

ESSEX COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of dress and school-rooms for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries,—books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Amesbury,	\$7,551 37	\$150 00	—	\$36 00	\$850 00	—	—	\$160 29	\$8,747 66	—
Andover, .	9,500 00	525 00	—	76 06	1,462 84	—	\$395 92	1,114 01	13,573 83	—
Beverly, .	18,345 72	222 00	—	45 00	5,648 71	—	—	2,267 30	26,528 73	—
Boxford, .	1,200 00	—	\$100 00	15 00	176 92	—	—	73 10	1,565 04	—
Bradford, .	5,412 76	225 00	—	30 00	1,401 12	—	705 21	528 63	8,302 72	—
Danvers, .	12,470 00	500 00	—	89 00	971 60	—	375 00	990 00	15,305 00	—
Essex, .	3,000 00	180 00	—	26 50	425 60	—	100 00	451 81	4,183 91	—
Georgetown, .	4,500 00	219 00	—	31 00	485 90	—	1,000 00	50 00	6,286 81	—
Gloucester, .	48,907 24	955 00	2,175 00	260 55	7,183 16	\$2,450 00	1,350 00	4,000 00	67,280 95	—
Groveland, .	3,500 00	160 00	—	—	559 45	—	—	59 03	4,278 48	—
Hamilton, .	800 00	45 00	—	9 00	50 00	—	—	9 00	913 00	—
Haverhill, .	57,128 17	1,274 00	—	—	8,182 14	30,040 89	12,509 37	—	109,134 57	—
Ipswich, .	6,100 00	240 00	—	25 00	860 68	—	—	239 37	7,465 05	—
Lawrence, .	72,829 21	—	2,400 00	336 00	7,954 60	4,688 41	5,000 00	2,904 89	96,113 14	—
Lynn, .	93,721 06	375 86	2,250 00	318 60	11,001 05	—	2,638 46	3,796 92	114,101 95	—
Lynnfield, .	700 00	83 00	—	29 75	182 38	—	—	203 06	1,198 19	—
Manchester, .	2,700 00	250 00	—	25 00	314 49	—	—	408 14	3,697 63	—
Marblehead, .	14,520 67	25 00	—	61 40	1,604 75	—	—	288 18	16,500 00	—
Merrimac, .	5,481 37	250 00	—	15 00	1,381 00	—	92 00	316 87	7,536 24	—
Methuen, .	9,000 00	—	600 00	28 00	1,657 71	—	—	488 38	11,774 09	—
Middleton, .	1,200 00	82 00	—	12 00	231 66	—	—	268 53	1,794 19	—
Nahant, .	3,891 39	275 00	—	86 50	414 63	147 50	—	328 81	5,143 83	—
Newbury, .	1,840 00	60 00	—	15 00	200 00	—	—	363 00	2,478 00	—

\$160 00

Newburyport, .	22,000 00	100 00	-	140 00	-	-	-	-	22,240 00	-
North Andover, .	9,000 00	424 50	-	48 00	-	-	-	-	11,627 51	-
Peabody, .	22,839 00	500 00	-	70 00	-	-	-	-	29,165 00	-
Rockport, .	6,741 00	350 00	-	30 00	-	-	-	-	9,715 10	-
Rowley, .	1,774 75	75 00	-	10 00	-	-	-	-	2,055 59	-
Salem, .	68,085 82	900 00	-	110 33	-	-	-	-	94,783 69	-
Salisbury, .	7,500 00	225 00	-	40 00	-	-	-	-	9,117 94	-
Saugus, .	6,026 33	180 00	-	20 00	-	-	-	-	7,143 77	-
Swampscott, .	6,789 13	310 00	-	32 00	-	-	-	-	8,952 67	-
Topsfield, .	1,400 00	75 00	-	9 58	-	-	-	-	2,331 82	-
Wenham, .	1,400 00	85 00	-	20 00	-	-	-	-	1,992 80	-
West Newbury, .	3,395 03	130 00	-	35 00	-	-	-	-	4,470 03	-
Totals, .	\$541,250 02	\$9,450 36	\$7,525 00	\$2,135 27	\$74,252 55	\$37,326 83	\$39,480 91	\$26,076 96	\$737,498 83	\$160 00

ESSEX COUNTY — CONCLUDED.

TOWNS.	Amount of local funds the income of which can be appropriated only for the support of Schools and Acad- emies.	Income of local funds.	Income of surplus rev- enue and other funds, including the dog tax, used at the option of the town.	ACADEMIES AND PRIVATE SCHOOLS.						Town's share of school fund payable Jan. 25, 1883.	How much of said fund was used for appa- ratus and books of reference.
				No. of Academies	Whole No. at- tending for the year.	Amount of tul- tion paid.	No. of Private Schools.	Whole No. at- tending for the year.	Estimated am't of tuition.		
Amesbury,	•	•	\$178 50	1	—	—	1	30	\$400 00	\$195 91	\$25 00
Andover,	•	\$12,595 00	—	2	411	\$20,725 30	1	26	598 00	53 58	—
Beverly,	•	180 00	508 03	1	—	—	1	25	275 00	97 86	—
Boxford,	•	179 48	163 77	1	—	—	1	15	—	208 78	—
Bradford,	•	—	—	1	139	7,020 00	2	33	1,740 00	182 51	—
Danvers,	•	80 00	441 00	1	—	—	1	20	500 00	71 00	—
Essex,	•	—	71 10	1	—	—	1	—	—	218 34	—
Georgetown,	•	—	106 91	1	—	—	1	—	—	174 12	—
Gloucester,	•	—	—	1	—	—	3	100	1,500 00	—	—
Groveland,	•	—	—	1	—	—	1	—	—	227 18	23 00
Hamilton,	•	—	—	1	—	—	1	—	—	207 02	—
Haverhill,	•	—	430 00	1	—	—	3	140	2,120 00	—	—
Ipswich,	•	2,375 72	164 77	1	—	—	3	—	—	189 73	—
Lawrence,	•	—	—	1	—	—	3	1,500	4,500 00	—	—
Lynn,	•	—	—	1	—	—	5	750	4,250 00	—	—
Lynnfield,	•	—	69 64	1	—	—	1	—	—	207 54	—
Manchester,	•	—	—	1	—	—	1	—	—	17 56	—
Marblehead,	•	—	420 75	1	—	—	2	50	200 00	88 82	—
Merrimac,	•	—	149 57	1	—	—	1	—	—	176 79	—
Methuen,	•	—	—	1	—	—	1	—	—	197 92	—
Middleton,	•	—	75 52	1	—	—	1	—	—	209 88	—
Nahant,	•	—	—	1	—	—	1	—	—	—	—
Newbury,	•	1,200 00	101 60	1	38	1,600 00	1	20	425 00	219 31	20 00

SCHOOL RETURNS.

XXV

Newburyport,	15,000 00	675 00	202 62	1	56	-	3	600	-	174 32	-
North Andover,	-	-	-	-	-	-	1	8	220 00	193 69	22 00
Peabody,	10,000 00	610 00	631 11	-	-	-	2	35	425 00	116 71	-
Rockport,	-	-	-	-	-	-	1	15	250 00	198 38	50 00
Rowley,	-	-	74 88	-	-	-	-	-	-	215 99	-
Salem,	12,925 00	775 00	2,351 00	-	-	-	20	1,383	10,000 00	-	-
Salisbury,	-	-	274 62	-	-	-	1	15	120 00	201 76	-
Saugus,	-	-	-	-	-	-	-	-	-	184 14	-
Swampscott,	-	-	-	-	-	-	-	-	-	24 71	-
Topsfield,	-	-	119 16	-	-	-	-	-	-	211 38	-
Wenham,	-	-	90 89	-	-	-	-	-	-	208 58	-
West Newbury,	-	-	113 77	-	-	-	-	-	-	170 29	44 20
Totals,	\$174,067 58	\$18,700 20	\$6,739 21	5	614	\$29,345 30	52	4,765	\$27,523 00	\$1,843 80	\$184 20

FRANKLIN COUNTY.

TOWNS.	Population—U. S. Cen- sus, 1880.	Valuation — 1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Pub- lic Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attend- ance based upon the average membership.	No. of teachers required by the Public Schools.
Ashfield, .	1,066	\$438,844	12	180	138	200	6	24	128	156	142	.91	12
Barnardston, .	934	384,111	6	150	98	143	2	2	98	120	108	.90	6
Buckland, .	1,739	504,175	10	337	231	346	2	16	231	276	248	.90	10
Charlemont, .	932	309,941	9	147	79	164	5	15	86	119	108	.90	9
Colerain, .	1,777	575,669	15	350	240	390	11	35	240	325	277	.85	16
Conway, .	1,760	735,872	13	305	170	347	8	29	173	277	236	.92	13
Deerfield, .	3,543	1,179,672	21	617	360	620	4	15	365	570	510	.89	21
Erving, .	872	349,510	5	143	87	169	5	6	87	138	122	.88	5
Gill, .	733	422,848	6	161	102	139	—	18	73	109	100	.92	6
Greenfield, .	3,903	3,087,424	21	822	528	1,011	3	132	569	811	739	.91	27
Hawley, .	592	152,613	8	111	80	137	2	18	76	114	97	.85	8
Heath, .	560	165,700	8	105	59	128	3	18	59	104	92	.88	8
Leverett, .	742	268,845	6	123	77	169	7	23	87	125	117	.94	6
Leyden, .	507	195,306	5	122	92	133	1	13	88	102	86	.84	5
Monroe, .	166	41,921	3	38	24	68	3	10	35	98	78	.80	3
Montague, .	4,875	2,871,288	25	1,347	887	1,143	—	26	782	1,034	953	.92	26
New Salem, .	869	307,670	8	127	88	150	4	17	97	122	110	.90	8
Northfield, .	1,603	621,009	9	247	169	282	5	23	153	223	199	.89	9
Orange, .	3,169	1,679,269	21	620	369	725	6	66	410	600	561	.94	22
Rowe, .	502	180,798	7	82	66	109	3	20	61	85	77	.90	7
Shelburne, .	1,621	840,476	11	251	169	329	2	29	221	250	228	.91	11
Shutesbury, .	629	149,720	7	91	57	107	4	14	65	92	87	.95	7
Sunderland, .	755	422,399	6	148	83	152	3	20	80	133	120	.91	5

Warwick,	713	268,788	9	120	67	135	1	7	61	113	109	96	9
Wendell,	465	200,717	5	84	56	121	2	10	56	80	73	.91	5
Whately,	1,074	414,883	6	200	158	187	4	23	91	120	103	.86	6
	36,001	\$16,769,968	262	7,028	4,534	7,604	96	629	4,472	6,296	5,700	.91	270

HAMPDEN COUNTY.

Agawam,	2,216	\$1,220,565	10	461	329	439	9	22	281	350	306	.87	11
Blandford,	979	346,397	13	196	162	230	6	26	162	176	157	.89	13
Brimfield,	1,203	485,285	10	175	118	189	10	7	134	165	143	.87	15
Chester,	1,473	505,250	10	220	165	280	6	22	153	217	185	.85	10
Chicopee,	11,286	5,515,140	29	2,185	1,334	1,604	37	87	892	1,142	1,043	.91	35
Granville,	1,205	349,383	11	230	153	282	7	41	169	207	177	.85	12
Hampden,	958	440,020	6	165	98	201	3	10	116	145	127	.88	6
Holland,	302	118,245	3	57	33	59	2	5	33	41	35	.85	3
Holyoke,	21,915	15,527,995	63	5,617	3,599	4,153	22	189	1,785	2,653	2,441	.92	81
Longmeadow,	1,401	901,128	11	241	151	314	4	33	179	252	199	.79	11
Ludlow,	1,526	787,756	11	345	210	411	7	22	234	276	244	.88	11
Monson,	3,758	1,410,568	19	594	352	642	11	21	348	463	426	.92	18
Montgomery,	303	137,560	5	53	36	62	-	15	36	56	48	.86	5
Palmer,	5,504	2,567,586	27	1,175	690	1,291	2	24	811	936	834	.89	29
Russell,	823	457,412	5	157	101	161	4	-	101	151	130	.86	5
Southwick,	1,104	556,307	10	195	117	234	6	25	142	173	150	.87	10
Springfield,	33,340	35,093,816	99	6,583	4,990	5,520	12	477	3,760	4,327	4,028	.93	125
Tolland,	452	165,530	7	70	40	66	1	11	28	59	55	.93	7
Wales,	1,030	310,586	7	155	79	176	3	6	76	128	114	.89	7
Westfield,	7,587	6,189,202	35	1,557	952	1,656	12	203	895	1,374	1,108	.81	43
West Springfield,	4,149	2,998,331	21	845	495	1,007	1	63	562	743	671	.90	22
Wilbraham,	1,628	702,693	9	264	167	284	3	13	163	212	189	.89	9
Totals,	104,142	\$76,786,755	421	21,540	14,371	19,261	168	1,322	11,060	14,246	12,820	.90	488

FRANKLIN COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.		Whole No. of different female teachers in school-year.		No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Public Schools.		Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	HIGH SCHOOLS.					Salary of Principal.
	male teachers in school-year.	female teachers in school-year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Avg wages per month of male teachers in Public Schools.	Avg wages per month of female teachers in Public Schools.	Public Schools.	Public Schools.				No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length. Months. Days.	
Ashfield,	1	17	3	1	\$30 00	\$20 60	60	82-5	6-15	1	1	1	1	1	-	-	-
Bernardston,	1	9	-	-	33 70	28 71	71	48	8	-	-	1	1	1	-	-	-
Buckland,	3	17	-	-	35 00	25 28	28	77 6	7-14	-	-	1	1	1	-	-	-
Charlemont,	3	10	1	-	22 67	23 00	00	51	6	-	-	1	1	1	-	-	-
Colerain,	3	22	1	-	60 00	20 28	28	93	6-2	-	-	1	1	1	-	-	-
Conway,	1	17	2	2	40 00	25 48	48	92-5	7-2	-	-	1	1	52	Taxation,	7-15	\$377 00
Deerfield,	1	26	5	5	39 00	30 00	00	169	8-1	-	-	1	1	32	Taxation,	9	400 00
Erving,	3	6	-	-	72 80	28 00	00	36	7	-	-	1	1	-	-	-	-
Gill,	-	10	1	-	28 00	23 95	95	43	7-3	-	-	1	1	-	-	-	-
Greenfield,	5	26	5	2	28 00	36 73	73	190-12	9	-	-	1	6	99	Taxation,	9-5	1,400 00
Hawley,	3	8	-	-	27 00	20 00	00	48	6	-	-	1	1	-	-	-	-
Heath,	2	8	-	-	34 00	23 11	11	46-17	7-16	-	-	1	1	-	-	-	-
Leverett,	1	8	-	-	25 00	26 00	00	30	6	-	-	1	1	-	-	-	-
Leyden,	1	6	1	1	23 00	18 00	00	18	6	-	-	1	1	-	-	-	-
Monroe,	2	4	-	-	55 55	37 15	15	222	8-16	-	-	1	2	39	Taxation,	9	550 00
Montague,	2	30	9	8	-	21 40	40	52-12	7-4	-	-	1	1	-	-	-	-
New Salem,	-	14	2	2	76 63	27 46	46	71-5	7-18	-	-	1	2	78	Taxation,	9-10	\$1,000 00
Northfield,	-	12	2	2	-	29 77	77	152-18	7-5	-	-	1	1	-	-	-	-
Orange,	2	24	1	1	32 00	19 25	25	42	6	-	-	1	1	-	-	-	-
Rowe,	-	11	3	2	-	31 00	00	90	8-4	-	-	1	1	-	-	-	-
Shelburne,	1	14	1	1	-	19 07	07	39	5-11	-	-	1	1	-	-	-	-
Shutesbury,	-	9	-	-	-	28 00	00	39-2	6-10	-	-	2	1	-	-	-	-
Sunderland,	-	5	1	1	-	20 00	00	56-10	6	-	-	1	1	-	-	-	-
Warwick,	1	13	1	1	40 00	20 00	00	56-10	6	-	-	1	1	-	-	-	-

SCHOOL RETURNS.

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[illegible]

HAMPDEN COUNTY — CONTINUED.

Agawam,	1	14	3	1	\$32 00	\$36 00	84-15	8-10	-	-	-	-	-	-
Blandford,	1	16	3	3	22 00	21 59	80	6	-	-	-	-	-	-
Brimfield,	1	15	-	-	32 00	26 44	60	6-13	1	4	89	Endowm't,	10	-
Chester,	-	14	2	1	-	24 60	71-7	7-3	-	-	-	Taxation,	9-12	-
Chicopee,	3	37	10	6	143 00	41 16	273-9	9-9	2	{ 2	49	Taxation,	9-12	{ 1,480 00 1,380 00
Granville,	-	14	3	-	-	27 69	77-10	7-1	1	-	-	-	-	-
Hampden,	3	8	3	2	29 00	29 00	53-6	8-17	-	-	-	-	-	-
Holland,	-	5	-	-	-	19 02	22-10	7-10	-	-	-	-	-	-
Holyoke,	7	69	17	15	118 33	42 54	556-19	9-13	3	1	137	Taxation,	9-17	1,900 00
Longmeadow,	1	15	-	-	38 33	29 75	97-18	8-18	-	-	-	-	-	-
Ludlow,	1	17	4	3	24 00	28 08	92	8-10	-	-	-	-	-	-
Monson,	4	23	-	-	37 00	30 60	152-10	8	1	3	76	Part tax,	9-15	1,500 00
Montgomery,	-	7	-	-	-	20 00	30	6	-	-	-	-	-	-
Palmer,	5	31	8	4	62 50	33 50	244	9-1	1	2	36	Taxation,	10	1,000 00
Russell,	-	9	4	2	-	28 00	35-5	7	-	-	-	-	-	-
Southwick,	2	14	-	-	42 00	25 11	82-10	8-5	1	1	30	Part tax,	8-5	495 00
Springfield,	12	120	36	26	177 50	62 11	990	10	1	11	327	Taxation,	10	2,700 00
Tolland,	-	10	1	-	-	20 75	43	6	2	-	-	-	-	-
Wales,	-	10	-	-	-	22 70	43-5	6-1	2	-	-	-	-	-
Westfield,	6	50	38	30	118 42	38 50	300	8-15	1	5	159	Taxation,	10	1,500 00
West Springfield,	1	22	9	-	120 00	33 71	190	9-1	1	2	55	Taxation,	10	1,200 00
Wilbraham,	-	13	3	3	-	29 10	72	8	-	-	-	-	-	-
Totals,	48	533	144	96	\$104 12	\$39 58	3,652-4	8-14	8	10	1,011	-	87-9	\$14,355 00

BOARD OF EDUCATION.

FRANKLIN COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1894-95.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries, books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Ashfield, .	\$1,600 00	\$100 00	-	\$8 50	\$215 00	-	\$969 45	\$15 00	\$2,907 95	-
Bernardston, .	2,000 00	79 50	-	192 89	-	-	-	49 74	2,322 13	-
Buckland, .	2,000 00	136 25	-	15 00	375 89	-	-	62 11	2,589 25	-
Charlemont, .	1,100 00	67 00	-	5 00	313 00	-	-	52 00	1,537 00	-
Colerain, .	2,100 00	102 50	-	7 92	233 37	-	223 00	76 68	2,743 47	-
Conway, .	2,500 00	138 75	-	9 00	260 01	-	-	120 65	3,028 41	-
Deerfield, .	5,500 00	340 00	-	18 00	848 63	\$666 92	400 00	350 00	8,123 55	-
Erving, .	1,200 00	42 17	-	-	163 95	-	-	38 63	1,444 75	-
Gill, .	800 00	58 00	-	7 00	165 35	1,700 00	-	12 14	2,742 49	-
Greenfield, .	11,350 00	344 50	-	-	2,318 95	-	203 28	433 04	14,651 77	-
Hawley, .	1,000 00	53 00	-	10 00	126 58	-	-	29 91	1,219 49	-
Heath, .	600 00	50 35	-	8 25	50 57	625 00	-	3 15	1,337 32	-
Leverett, .	800 00	91 00	-	5 00	193 28	-	-	47 53	1,136 81	\$40 10
Layden, .	800 00	45 00	-	10 00	-	-	-	16 11	871 11	-
Monroe, .	200 00	23 25	-	5 00	76 07	-	-	25 85	330 17	-
Montague, .	9,852 49	300 00	-	-	1,193 82	-	979 83	-	12,326 14	-
New Salem, .	1,200 00	45 75	-	15 00	246 18	694 09	496 16	140 96	2,840 96	-
Northfield, .	2,200 00	114 38	-	23 20	265 87	-	-	224 60	2,828 05	-
Orange, .	6,505 00	266 07	-	26 00	176 10	1,021 19	96 23	474 33	8,561 92	-
Rowe, .	600 00	38 00	-	6 65	366 92	-	26 00	8 78	1,016 35	-
Shelburne, .	3,000 00	-	\$100 00	18 00	573 58	662 60	171 41	28 59	4,553 58	-
Shutesbury, .	500 00	40 00	-	10 00	101 47	-	-	71 30	722 77	-
Sunderland, .	1,200 00	65 00	-	7 50	262 63	-	-	16 31	1,551 44	-

SCHOOL RETURNS.

xxxii

HAMPDEN COUNTY — CONTINUED.

Warwick,	1,151 17	—	65 00	11 20	48 92	—	14 00	—	1,276 29	—
Wendell,	700 00	48 00	—	—	103 50	900 00	—	3 00	1,768 50	—
Whately,	1,200 00	60 00	—	10 00	461 61	—	—	15 00	1,746 61	—
Totals,	\$61,658 66	\$2,648 47	\$165 00	\$429 11	\$9,141 25	\$6,269 20	\$3,581 36	\$2,315 41	\$86,211 28	\$40 10
Agawam,	\$3,000 00	\$130 00	—	\$20 00	\$490 00	—	—	\$440 35	\$1,080 35	—
Blandford,	1,500 00	47 25	—	10 00	—	—	—	47 22	1,604 47	—
Brimfield,	1,600 00	100 00	—	4 75	—	—	—	221 08	2,372 23	—
Chaster,	1,600 00	130 00	—	—	298 60	—	—	50 75	2,079 35	—
Chicopee,	21,650 00	45 00	\$1,600 00	6 00	3,105 00	—	\$1,000 00	1,000 00	28,400 00	—
Granville,	2,000 00	100 00	—	23 00	394 06	—	237 58	18 91	2,756 55	—
Hampden,	1,400 00	108 00	—	3 00	319 74	—	111 18	24 13	1,986 05	—
Holland,	200 00	27 58	—	80 00	60 00	—	—	7 50	298 08	—
Holyoke,	46,361 08	—	1,900 00	24 00	6,424 79	\$25,221 45	2,450 26	643 96	83,081 54	—
Longmeadow,	3,000 00	184 29	—	24 00	382 86	—	140 60	82 51	3,814 26	—
Ludlow,	3,500 00	150 00	—	8 80	—	—	—	70 41	3,729 21	—
Monson,	5,500 00	343 75	—	23 00	856 19	—	—	63 00	6,785 94	—
Montgomery,	350 00	13 00	—	—	—	—	—	—	363 00	—
Palmer,	11,400 00	600 00	—	58 00	1,687 47	—	1,255 43	292 86	15,293 76	—
Russell,	800 00	102 13	—	8 00	219 11	—	—	24 89	1,154 13	—
Southwick,	1,500 00	212 50	—	13 00	336 32	—	—	25 00	2,086 82	—
Springfield,	94,055 00	—	3,000 00	75 00	10,393 95	7,159 73	3,200 00	6,959 73	124,843 41	—
Tolland,	400 00	29 00	—	2 50	—	—	—	—	431 50	\$90 00
Wales,	1,025 00	68 75	—	—	130 00	—	—	5 00	1,228 75	—
Westfield,	20,700 00	650 00	—	—	2,500 00	10,000 00	200 00	800 00	34,850 00	—
W. Springfield,	9,200 00	267 06	—	4 50	500 00	—	—	165 70	10,137 26	—
Wilbraham,	2,200 00	122 50	—	8 80	284 81	860 00	174 49	60 22	3,650 82	—
Totals,	\$232,941 08	\$3,430 81	\$6,500 00	\$372 35	\$28,382 90	\$43,181 18	\$8,769 54	\$11,032 22	\$335,027 48	\$90 00

FRANKLIN COUNTY — CONCLUDED.

[illegible]

SCHOOL RETURNS.

xxxiii

Warwick,	500 00	20 20	-	-	-	-	368 78	-
Wendell,	540 00	32 40	27 75	-	-	-	305 79	9 45
Whately,	-	-	-	-	-	-	213 07	-
Totals,	\$70,704 83	\$3,670 99	\$1,094 72	5	668	\$13,981 31	\$7,945 57	\$182 30

HAMPDEN COUNTY — CONCLUDED.

Agawam,	-	\$180 00	\$160 80	-	-	-	\$178 41	-
Blandford,	\$3,000 00	-	73 14	-	-	-	312 29	-
Brimfield,	-	-	-	-	-	-	313 39	-
Chester,	-	-	137 34	-	-	-	318 86	-
Chicopee,	-	-	-	1	-	12	128 03	\$62 98
Granville,	-	-	403 82	2	-	998	314 63	51 00
Hampden,	-	-	67 00	-	-	-	309 62	-
Holland,	222 22	13 33	35 00	-	-	-	303 12	-
Holyoke,	-	-	-	-	-	1,691	-	-
Longmeadow,	731 00	47 48	133 98	4	-	8,725 00	215 54	-
Ludlow,	-	-	-	-	-	-	225 62	56 15
Monson,	23,000 00	1,100 00	184 59	1	76	50 00	184 59	-
Montgomery,	-	-	-	-	-	-	303 45	41 61
Palmer,	850 00	34 34	260 74	1	-	-	225 49	-
Russell,	-	-	72 02	-	-	-	310 14	-
Southwick,	15,618 03	923 05	100 47	-	-	-	212 87	-
Springfield,	-	-	-	-	-	1,200	-	-
Tolland,	-	-	37 97	8	-	15,000 00	304 55	40 72
Wales,	-	-	38 52	-	-	-	310 99	-
Westfield,	100,833 22	5,219 86	523 71	-	-	-	100 08	-
West Springfield,	14,000 00	800 00	280 33	1	-	25	208 71	-
Wilbraham,	1,308 40	78 50	96 38	1	400	-	216 97	-
Totals,	\$159,562 87	\$8,396 56	\$2,605 81	3	476	\$14,256 41	\$4,997 35	\$252 46
				18		\$24,165 00		

HAMPSHIRE COUNTY.

TOWNS.	Population—U. S. Census, 1880.	Valuation—1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attendance based upon the average membership.	No. of teachers required by the Public Schools.
Amherst, .	4,298	\$2,782,253	19	602	376	761	7	127	417	610	557	.91	21
Belchertown, .	2,346	928,075	20	506	340	537	12	51	340	425	387	.91	20
Chesterfield, .	769	289,970	7	122	96	140	4	15	96	115	102	.89	7
Cummington, .	881	327,427	9	121	74	185	3	51	96	160	152	.95	9
Easthampton, .	4,206	2,541,927	20	804	502	842	6	58	523	689	617	.90	25
Enfield, .	1,043	587,110	7	168	89	184	3	17	96	174	154	.89	7
Goshen, .	327	138,390	4	58	41	76	2	16	51	57	54	.95	4
Granby, .	753	425,564	9	135	67	151	1	4	67	144	137	.95	9
Greenwich, .	633	292,616	6	84	49	100	-	7	42	72	70	.97	6
Hadley, .	1,938	1,133,656	13	351	219	403	5	28	262	337	305	.90	13
Hatfield, .	1,495	930,340	7	295	202	287	-	5	199	227	198	.87	7
Huntington, .	1,236	477,675	8	186	104	238	8	17	104	178	152	.86	8
Middlefield, .	648	273,110	9	138	106	170	7	11	110	119	106	.89	9
Northampton, .	12,172	8,586,172	57	2,383	1,388	2,497	12	153	1,458	1,990	1,830	.92	64
Pelham, .	614	170,644	4	97	72	106	-	9	71	77	66	.86	4
Plainfield, .	457	143,310	6	65	48	90	4	18	48	74	67	.91	6
Prescott, .	460	180,905	5	83	65	95	1	19	65	81	78	.96	5
South Hadley, .	1,046	1,545,718	16	655	491	858	5	100	539	629	568	.90	19
Southampton, .	3,538	494,653	8	177	95	187	4	17	87	138	123	.89	8
Ware, .	4,817	2,830,578	22	1,012	684	1,091	15	56	691	812	748	.92	23
Westhampton, .	563	256,023	5	113	72	126	4	10	70	91	81	.89	5

SCHOOL RETURNS.

xxxv

Williamsburg, .	2,234	897,485	11	434	396	430	4	24	343	410	356	.87	17
Worthington, .	758	329,049	11	103	85	121	1	17	83	105	97	.92	9
Totals, .	47,232	\$26,562,650	283	8,692	5,661	9,678	108	830	5,858	7,714	7,005	.91	305

HAMPSHIRE COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	A'v'ge wages per month of male teachers in Public Schools.	A'v'ge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	HIGH SCHOOLS.					Salary of Principal.
										No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length.	
Amherst, .	5	30	1	1	\$75 55	\$32 00	162	8-10	-	1	3	94	Part tax,	9	\$1,000 00
Belchertown, .	9	21	-	-	36 72	25 94	152-10	7-12	2	1	1	51	Part tax,	9	600 00
Chesterfield, .	3	7	-	-	25 25	20 00	47-15	6-16	-	-	-	-	-	-	-
Cummington, .	2	10	1	1	37 33	20 91	53-15	6	-	1	2	53	Taxation,	5	250 00
Easthampton, .	-	25	4	4	-	32 50	179-15	8-19	1	1	2	58	Taxation,	9-15	733 00
Enfield, .	1	8	1	1	48 00	27 28	53-7	7-13	1	-	-	-	-	-	-
Gosben, .	1	7	1	1	24 00	20 60	25	6-5	-	-	-	-	-	-	-
Granby, .	2	9	4	2	25 00	24 00	74-5	8-5	-	1	1	28	Taxation,	8-5	500 00
Greenwich, .	-	9	3	3	-	5 75	45	7-10	-	-	-	-	-	-	-
Hadley, .	-	17	5	-	-	27 12	99-10	7-13	-	1	2	43	Not by tax.	9-10	800 00
Hatfield, .	-	8	-	-	-	28 00	60-10	8-18	-	-	-	-	-	-	-
Huntington, .	2	9	-	-	24 00	24 35	63-15	7-19	-	-	-	-	-	-	-
Middlefield, .	1	11	-	-	20 00	20 40	60-5	7-3	2	-	-	-	-	-	-
Northampton, .	6	74	8	8	113 00	36 40	505-10	8-17	-	1	5	112	Taxation,	10	1,600 00
Pelham, .	-	9	-	-	-	23 00	30	7-10	-	-	-	-	-	-	-
Plainfield, .	-	6	-	-	-	17 91	33	5-10	1	-	-	-	-	-	-
Prescott, .	2	7	-	-	24 00	20 50	87-10	7-10	-	-	-	-	-	-	-
South Hadley, .	3	21	3	2	105 00	36 33	148	9-5	-	2	4	94	Taxation,	9-5	{ 1,500 00.
Southampton, .	-	12	1	1	-	28 25	63	7-17	-	1	1	25	Taxation,	6	{ 1,000 00
Ware, .	7	28	7	5	66 33	37 70	166	7-10	2	1	2	34	Taxation,	9-5	228 00
Westhampton, .	2	7	-	-	25 00	25 12	34-15	6-19	-	-	-	-	-	-	1,000 00

Williamsburg,	3	19	2	-	12 50	25 60	128	8	-	1	1	34	Taxation,	8	512 00
Worthington,	2	18	4	1	35 50	22 16	62-10	6-10	2	1	1	21	Taxation,	3	150 00
Totals, .	51	372	42	30	\$53 19	\$29 67	2,335-12	8-5	11	13	25	647	-	96	\$9,873 00

HAMPSHIRE COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries,—books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Amherst, . . .	\$7,631 44	\$500 00	—	\$10 00	\$1,396 00	—	\$392 00	\$275 00	\$10,204 44	—
Belchertown, . .	4,000 00	284 25	—	22 00	591 74	\$2,885 02	—	166 93	7,949 94	—
Chesterfield, . .	900 00	50 00	—	10 00	114 00	1,139 00	—	5 00	2,218 00	—
Cummington, . .	1,200 00	46 00	—	—	150 00	—	100 00	—	1,496 00	—
Easthampton, . .	8,150 00	200 00	—	15 00	953 17	3,275 00	267 00	400 00	13,260 17	—
Enfield, . . .	1,700 00	109 11	—	9 00	327 06	—	—	—	2,145 17	—
Goshen, . . .	300 00	32 50	—	4 00	108 71	—	—	6 00	451 21	—
Granby, . . .	1,800 00	109 40	—	10 00	179 39	—	—	56 04	2,154 83	—
Greenwich, . . .	800 00	10 00	\$65 00	5 00	176 74	—	141 38	20 53	1,218 65	—
Hadley, . . .	2,750 00	157 07	—	20 00	397 13	—	—	222 19	3,546 39	—
Hatfield, . . .	2,300 00	125 00	—	—	68 31	—	—	164 27	2,657 58	—
Huntington, . .	1,700 00	152 00	—	10 00	228 98	—	143 42	41 82	2,276 47	—
Middlefield, . .	800 00	42 25	—	8 90	142 50	—	—	15 00	1,908 65	—
Northampton, . .	26,700 00	—	1,000 00	122 40	4,482 02	—	—	2,313 23	34,317 65	—
Pelham, . . .	600 00	—	50 00	3 00	136 91	—	75 30	15 48	880 69	—
Plainfield, . . .	500 00	33 89	—	5 00	66 20	—	82 08	6 69	693 86	—
Prescott, . . .	500 00	47 00	—	—	—	—	196 00	23 00	766 00	—
South Hadley, . .	8,828 20	125 00	—	30 00	1,202 36	—	—	221 22	10,406 78	—
Southampton, . .	1,450 00	61 00	—	—	261 01	—	31 00	121 75	1,924 76	—
Ware, . . .	9,200 00	441 75	—	35 00	2,621 98	—	1,996 81	391 60	14,687 14	—
Westhampton, . .	1,000 00	78 05	—	—	139 76	—	153 41	24 50	1,395 75	—

Williamsburg, .	3,000 00	230 00	-	12 00	28 77	350 00	-	95 75	3,716 52	-
Worthington, .	1,233 00	75 00	-	7 00	52 06	-	-	-	1,367 06	-
Totals, .	\$87,042 64	\$2,909 27	\$1,115 00	\$338 30	\$13,524 80	\$7,649 02	\$3,578 43	\$4,586 00	\$120,743 71	\$42 00

HAMPSHIRE COUNTY — CONCLUDED.

TOWNS.	Amount of local funds the income of which can be appropriated only for the support of Schools and Academies.	Income of local funds.	Income of surplus revenue and other funds, including the dog tax, used at the option of the town.	ACADEMIES AND PRIVATE SCHOOLS.						Town's share of school fund payable Jan. 25, 1885.	How much of said fund was used for apparatus and books of reference.
				No. of Academies.	Whole No. attending for the year.	Amount of tuition paid.	No. of Private Schools.	Whole No. attending for the year.	Estimated amount of tuition.		
Amherst, .	\$5,000 00	\$300 00	\$173 89	—	—	—	5	—	\$3,200 00	\$186 93	—
Belchertown, .	6,000 00	200 00	208 24	—	—	—	—	—	—	231 21	—
Chesterfield, .	1,100 00	55 00	36 55	—	—	—	—	—	—	308 13	\$18 00
Cummington, .	—	—	26 29	—	—	—	—	—	—	308 91	—
Easthampton, .	257,200 00	13,689 70	150 89	1	199	\$10,879 26	—	—	—	204 88	—
Enfield, .	—	—	—	—	—	—	—	—	—	210 34	—
Goshen, .	—	—	—	—	—	—	—	—	—	304 10	—
Granby, .	—	—	63 19	—	—	—	—	—	—	308 78	—
Greenwich, .	300 00	30 00	38 59	—	—	—	—	—	—	304 81	—
Hadley, .	37,300 00	2,275 28	—	—	—	—	—	—	—	173 67	—
Hatfield, .	57,000 00	3,073 83	50 89	1	53	250 00	—	—	—	168 47	41 25
Huntington, .	—	—	79 37	1	—	—	1	5	20 00	311 96	—
Middlefield, .	—	—	131 29	—	—	—	—	—	—	308 26	—
Northampton, .	3,074 93	180 00	—	—	—	—	4	158	2,500 00	160 15	—
Pelham, .	—	—	60 87	—	—	—	—	—	—	306 63	—
Plainfield, .	—	—	17 38	—	—	—	—	—	—	303 84	—
Prescott, .	—	—	23 04	—	—	—	—	—	—	305 72	—
South Hadley, .	—	—	173 89	1	270	47,250 00	—	—	—	190 90	15 00
Southampton, .	2,250 00	135 00	64 46	1	—	—	—	—	—	311 05	—
Ware, .	—	—	—	—	—	—	2	32	250 00	209 17	—
Westhampton, .	—	—	29 05	—	—	—	1	4	157 00	307 61	—

SCHOOL RETURNS.

xli

Williamsburg,	12,000 00	979 00	100 51	-	-	-	228 09	-
Worthington,	4,403 00	228 15	51 73	-	-	-	307 87	38 83
Totals,	\$385,627 93	\$21,145.96	\$1,480 12	5	522	\$58,379 26	\$5,961 48	\$113 08

MIDDLESEX COUNTY.

TOWNS.	Population—U. S. Census, 1880.	Valuation — 1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attendance based upon the average membership.	No. of teachers required by the Public Schools.
Acton,	1,797	\$1,264,216	10	263	166	294	7	34	155	257	240	.93	10
Arlington,	4,100	4,868,898	21	935	594	1,018	—	108	556	833	728	.87	25
Ashby,	914	471,035	10	148	96	202	2	52	98	199	181	.91	11
Ashland,	2,394	1,404,717	12	481	289	535	2	33	284	437	395	.90	13
Ayer,	1,881	1,131,737	10	415	327	471	2	49	264	386	350	.91	10
Bedford,	931	742,662	5	136	87	144	1	10	87	114	99	.87	5
Belmont,	1,615	2,862,707	8	300	275	327	—	12	184	281	252	.90	11
BillERICA,	2,000	1,589,116	9	379	232	283	—	7	230	294	254	.86	9
Boxborough,	319	253,742	4	44	32	51	1	10	32	44	42	.95	4
Burlington,	711	484,942	5	123	62	116	1	6	65	95	85	.89	5
Cambridge,	52,669	53,548,692	—	10,682	6,608	9,982	—	349	6,396	8,415	7,763	.92	216
Carlisle,	478	401,605	4	65	45	91	2	9	45	64	61	.95	4
Chelmsford,	2,553	1,495,255	14	373	216	493	18	49	260	391	346	.88	15
Concord,	3,922	3,100,569	15	520	334	738	3	94	367	572	510	.89	18
Dracut,	1,595	1,198,519	10	330	164	371	5	21	205	265	236	.89	11
Dunstable,	453	298,446	5	63	46	86	1	16	46	64	62	.97	5
Everett,	4,159	4,950,150	23	965	556	1,212	—	70	714	962	878	.91	26
Frammingham,	6,235	5,738,130	28	1,240	1,000	1,525	4	103	1,050	1,168	1,054	.90	36
Groton,	1,862	2,689,480	12	304	175	349	11	34	154	223	212	.95	12
Holliston,	3,098	1,732,317	15	532	389	603	10	61	328	501	469	.92	17
Hopkinton,	4,601	2,207,738	21	787	483	869	11	69	485	706	652	.92	22
Hudson,	3,739	2,028,778	15	853	494	888	13	49	488	739	679	.92	19
Lexington,	2,460	2,581,867	11	412	264	458	2	44	225	346	321	.93	12

SCHOOL RETURNS.

xliii

Lincoln,	907	1,105,877	5	171	94	178	3	21	98	135	120	.89	5
Littleton,	994	773,805	7	174	97	204	1	29	97	169	158	.93	8
Lowell,	59,475	51,170,095	93	11,168	5,976	8,941	-	625	5,081	6,560	6,095	.93	169
Malden,	12,017	11,868,187	48	2,846	1,533	2,321	-	173	1,255	1,763	1,639	.93	54
Marlborough,	10,127	4,190,975	44	2,100	1,425	2,296	5	85	1,399	1,950	1,756	.90	51
Maynard,	2,291	1,834,223	9	470	273	571	-	6	273	441	395	.87	11
Medford,	7,573	8,182,852	30	1,437	1,040	1,554	-	113	889	1,360	1,266	.94	35
Melrose,	4,560	4,469,938	21	1,132	1,009	1,183	-	134	666	1,079	940	.87	24
Natick,	8,479	4,675,875	34	1,571	968	1,745	-	118	984	1,543	1,418	.92	40
Newton,	16,995	27,814,561	78	3,653	2,088	3,963	18	487	2,274	3,279	2,992	.91	93
North Reading,	900	507,592	6	133	86	170	2	11	87	139	115	.83	6
Pepperell,	2,348	1,510,490	12	424	275	516	4	36	278	390	352	.90	12
Reading,	3,181	2,370,768	15	578	358	659	10	79	358	560	504	.90	17
Sherborn,	1,401	806,560	6	182	130	195	-	1	127	146	130	.89	6
Shirley,	1,365	713,430	7	210	147	253	4	17	155	197	174	.88	7
Somerville,	24,933	24,331,100	102	6,032	3,577	6,014	-	522	3,520	4,804	4,533	.94	115
Stoneham,	4,894	3,065,495	21	881	513	1,025	5	75	555	819	758	.92	24
Stow,	1,045	980,206	6	200	114	189	1	21	104	144	140	.97	6
Sudbury,	1,178	1,035,890	8	188	104	202	1	6	103	174	155	.89	8
Tewksbury,	2,179	1,124,033	7	228	135	264	9	11	141	177	159	.85	7
Townsend,	1,967	1,000,000	14	339	260	351	5	37	211	284	246	.87	14
Tyngsborough,	631	322,405	7	87	75	115	3	18	75	108	92	.84	8
Wakefield,	5,547	3,541,772	24	1,258	757	1,323	-	126	791	1,008	909	.90	28
Waltham,	11,712	10,391,660	48	2,233	1,363	2,792	6	138	1,677	2,353	2,185	.93	60
Watertown,	5,426	7,057,100	21	1,027	806	1,279	4	110	733	988	917	.93	28
Wayland,	1,962	1,168,866	10	343	264	343	-	18	264	310	291	.94	11
Westford,	2,147	1,021,577	11	390	255	443	10	15	276	346	311	.90	13
Weston,	1,448	1,871,850	8	235	741	258	6	17	141	206	194	.94	8
Wilmington,	933	569,364	6	169	109	198	5	19	109	134	110	.82	6
Winchester,	3,802	3,751,716	14	681	472	788	5	102	472	683	628	.92	19
Woburn,	10,931	7,922,875	51	2,421	1,377	2,530	-	309	1,417	1,863	1,737	.93	55
Totals,	317,830	\$288,196,455	1,040	63,311	39,355	63,969	203	4,768	37,328	51,468	47,270	.92	1,464

SCHOOL RETURNS.

xlv

Lincoln,	2	4	-	-	64 00	36 00	45	9	-	1	1	32	Taxation,	9	576 00
Littleton,	5	8	-	-	42 54	33 91	51-8	7-6	-	1	1	27	Taxation,	8-8	413 00
Lowell,	14	159	66	37	167 27	57 59	846-3	9-13	2	1	11	536	Taxation,	9-13	2,000 00
Malden,	2	52	31	22	170 00	52 24	468	10	-	1	5	146	Taxation,	10	2,200 00
Marlborough,	3	54	11	9	133 33	41 39	405	9	-	1	3	73	Taxation,	9	1,400 00
Maynard,	1	10	-	7	88 88	40 00	81	9	-	1	2	74	Taxation,	9	800 00
Medford,	6	27	7	7	48 50	50 00	300	10	-	1	4	118	Taxation,	10	2,200 00
Melrose,	1	27	13	9	160 00	50 20	208	9-18	-	1	3	124	Taxation,	10	1,600 00
Natick,	6	49	24	21	117 20	41 22	306-15	9	-	1	4	112	Taxation,	10	1,200 00
Newton,	17	90	16	27	177 00	65 60	780	10	-	1	12	337	Taxation,	10	2,500 00
North Reading,	1	7	5	5	51 33	28 89	53-8	8-18	1	1	1	35	Taxation,	9	462 00
Pepperell,	4	13	-	-	78 33	36 66	350	-	-	1	1	55	Taxation,	10	900 00
Reading,	1	20	8	8	126 32	37 00	140-17	9-8	-	1	3	76	Taxation,	9-10	1,200 00
Sherborn,	1	6	2	1	36 00	34 12	51	8-10	-	1*	2	50	Amt. of \$400,	9-5	1,000 00
Shirley,	2	8	1	1	60 00	28 10	52-5	7-9	-	-	-	-	-	-	-
Somerville,	8	107	25	21	162 98	54 60	936	9-15	-	1	8	401	Taxation,	9-15	2,400 00
Stoneham,	2	30	7	6	170 00	42 67	155-10	9-15	1	1	3	74	Taxation,	10	1,700 00
Stow,	1	8	2	1	94 44	36 76	54	9	-	1	1	22	Part tax,	9	850 00
Sudbury,	-	12	6	6	-	37 00	63-15	7-2	-	-	-	-	-	-	-
Tewksbury,	1	6	1	1	36 00	35 00	63	9	-	-	-	-	-	-	-
Townsend,	3	18	3	2	40 00	28 00	106	7-11	-	1	1	35	Taxation,	10	600 00
Tyngsborough,	1	11	5	5	60 00	25 00	461	6-14	5	1	1	32	Part tax,	3	180 00
Wakefield,	6	30	14	14	101 25	42 25	233	9-7	-	1	3	109	Taxation,	10	1,800 00
Waltham,	8	63	24	19	116 80	54 34	467-4	9-15	-	1	6	139	Taxation,	10	1,800 00
Watertown,	5	27	9	8	140 00	47 76	202-9	9-13	-	1	3	88	Taxation,	10	2,000 00
Wayland,	3	10	3	1	67 50	34 50	90	9	-	-	-	-	-	-	-
Westford,	1	14	4	3	32 00	31 66	91	8-5	-	-	-	-	-	-	-
Weston,	1	7	2	2	133 33	42 00	72	9	-	1	1	40	Taxation,	9	1,200 00
Wilmington,	2	6	3	3	48 00	32 00	49	8-3	-	1	1	35	Taxation,	8-10	408 00
Winchester,	2	17	8	6	175 00	45 58	140	10	-	1	3	77	Taxation,	10	1,800 00
Woburn,	5	50	10	7	107 00	47 40	508	10	-	1	4	161	Taxation,	10	1,800 00
Totals, ..	160	1,481	538	442	\$123 89	\$47 42	10463-10	10-1	12	43	121	4,371	-	391-11	\$56,233 00

* United with Savin Academy.

MIDDLESEX COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries, books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Acton, .	\$4,000 00	-	\$100 00	\$25 00	\$685 55	-	\$258 23	\$413 81	\$5,482 59	-
Arlington, .	20,000 00	-	-	-	2,262 80	-	2,172 34	304 63	24,739 77	-
Ashby, .	1,900 00	-	75 00	12 00	327 48	-	133 50	68 09	2,516 07	-
Ashland, .	4,100 00	\$125 60	-	11 00	842 09	-	-	76 56	5,254 65	-
Ayer, .	4,000 00	150 00	-	33 80	473 72	-	325 85	213 50	5,196 87	-
Bedford, .	1,600 00	100 00	-	30 00	220 87	-	-	25 10	1,975 97	-
Belmont, .	6,359 82	213 00	-	30 00	495 13	-	265 44	71 03	7,434 42	-
Billerica, .	3,000 00	240 00	-	36 25	496 69	-	-	245 57	4,018 51	-
Boxborough, .	568 76	-	35 00	8 00	237 76	-	46 00	9 72	941 24	-
Burlington, .	1,100 00	35 00	-	13 00	204 00	-	859 66	-	2,211 46	-
Cambridge, .	168,357 08	805 00	2,700 00	300 00	20,377 50	\$17,304 34	-	13,367 92	223,211 84	\$214 50
Carlisle, .	800 00	-	35 00	10 00	93 00	-	-	-	938 00	-
Chelmsford, .	4,500 00	-	210 00	25 00	719 00	-	-	338 65	5,792 65	-
Concord, .	11,800 00	84 50	-	-	961 37	-	-	456 58	13,302 45	-
Dracont, .	3,000 00	-	150 00	26 25	204 70	-	599 51	45 08	4,025 51	-
Dunstable, .	750 00	33 00	-	10 00	55 00	-	185 00	-	1,033 00	15 00
Everett, .	13,170 00	-	1,000 00	10 62	2,261 77	-	600 10	959 68	18,002 61	-
Framingham, .	18,000 00	-	800 00	25 00	1,800 00	-	-	800 00	21,425 00	-
Groton, .	5,000 00	200 00	-	21 00	773 72	-	-	165 37	6,160 09	-
Holliston, .	5,800 00	-	400 00	51 00	1,119 89	-	-	138 72	7,509 61	-
Hopkinton, .	7,000 00	300 00	-	20 00	1,500 00	-	-	600 00	9,420 00	-
Hudson, .	8,000 00	280 00	-	21 00	1,081 16	-	-	397 89	9,780 55	-
Lexington, .	8,400 00	300 00	-	25 00	986 32	-	-	600 00	10,311 32	-

SCHOOL RETURNS.

xlvii

Lincoln, .	2,300 00	37 00	-	20 00	229 56	-	-	69 46	2,656 02	-
Littleton, .	2,400 00	80 00	-	28 00	442 17	-	-	117 03	3,667 70	14 12
Lowell, .	138,174 27	-	2,400 00	507 50	16,665 17	37,530 30	16,551 84	7,583 59	219,412 67	-
Malden, .	39,180 30	100 00	2,025 00	13 27	7,651 38	-	-	2,686 46	51,656 41	-
Marlborough, .	22,900 00	300 00	1,700 00	100 00	1,748 05	-	400 00	812 86	28,960 91	-
Maynard, .	5,000 00	105 00	-	25 00	156 96	-	-	770 44	6,057 40	-
Medford, .	26,181 46	400 00	-	18 00	2,997 71	-	8,570 43	1,737 00	39,904 60	-
Melrose, .	15,500 00	450 00	-	8 00	4,732 00	-	-	500 00	21,190 00	-
Natick, .	22,000 00	450 00	-	-	-	-	1,000 00	1,500 00	22,950 00	44 00
Newton, .	86,283 12	300 00	2,700 00	214 60	12,456 20	44,516 66	1,923 74	3,933 38	152,327 70	-
North Reading, .	1,900 00	104 75	-	15 00	194 82	-	-	357 38	2,571 95	-
Pepperell, .	4,400 00	-	250 00	15 50	1,282 09	-	500 00	62 00	6,509 59	-
Reading, .	8,100 00	290 00	-	30 00	1,926 34	-	-	386 25	10,732 59	-
Sherborn, .	2,100 00	196 00	-	30 00	293 39	-	359 93	216 75	3,196 07	-
Shirley, .	2,000 00	95 00	-	15 00	375 55	-	-	120 20	2,605 75	-
Somerville, .	81,124 00	-	1,800 00	-	9,110 00	22,855 00	-	9,571 00	124,460 00	-
Stoneham, .	14,035 00	400 00	-	-	1,424 62	-	173 89	824 32	16,857 83	-
Stow, .	1,700 00	-	100 00	18 00	266 42	-	-	163 08	2,247 50	-
Sudbury, .	2,000 00	216 25	-	13 50	432 03	-	239 75	8 55	2,910 08	-
Tewksbury, .	2,800 00	150 00	-	13 00	182 87	-	-	310 47	3,456 34	-
Townsend, .	3,500 00	100 00	-	15 00	472 12	-	-	140 50	4,227 62	-
Tyngsborough, .	1,150 00	-	75 00	16 25	-	404 59	-	25 00	1,670 84	-
Wakefield, .	16,200 00	250 00	-	150 00	3,037 55	6,536 53	996 30	594 88	27,765 26	-
Waltham, .	41,264 18	-	2,000 00	17 50	6,708 11	17,350 94	7,663 41	1,600 43	76,604 57	-
Watertown, .	17,505 00	300 00	470 00	25 00	1,374 58	12,500 00	-	1,157 03	33,331 61	-
Wayland, .	4,500 00	150 00	-	25 00	300 00	-	650 00	-	5,625 00	-
Westford, .	3,500 00	-	150 00	17 00	385 25	6,500 00	136 03	42 68	10,730 96	-
Weston, .	4,500 00	150 00	-	-	300 00	-	-	300 00	5,250 00	-
Wilmington, .	1,800 00	85 00	-	-	203 00	-	-	-	2,088 93	-
Winchester, .	13,570 69	-	650 00	-	1,725 27	-	-	1,095 84	17,041 80	125 00
Woburn, .	33,480 00	-	1,620 00	80 00	3,732 00	-	-	1,978 00	40,890 00	-
Totals, .	\$922,253 68	\$7,574 50	\$21,445 00	\$2,174 04	\$118,984 73	\$165,498 36	\$44,610 95	\$57,962 48	\$1,339,641 91	\$412 62

SCHOOL RETURNS.

xlix

Lincoln,	1,209 00	69 95	-	-	-	-	-	-	-	-	-	160 92	5 00
Littleton,	3,500 00	210 00	212 61	-	-	-	-	-	-	-	-	212 61	-
Lowell, .	-	-	-	1	60	-	-	-	-	-	-	-	-
Malden,	-	-	-	-	-	-	-	-	-	-	-	-	-
Marlborough,	2,000 00	120 00	33 00	-	-	-	-	-	-	-	-	133 49	271 00
Maynard,	-	-	-	-	-	-	-	-	-	-	-	189 92	-
Medford,	-	-	-	-	-	-	-	-	-	-	-	93 57	-
Melrose,	-	-	-	-	-	-	-	-	-	-	-	65 22	20 00
Natick, .	-	-	-	-	-	-	-	-	-	-	-	102 21	-
Newton,	-	-	1,581 88	2	260	-	-	-	-	-	-	-	-
North Reading,	-	-	133 28	-	-	-	-	-	-	-	-	209 49	29 67
Pepperell,	-	-	-	-	-	-	-	-	-	-	-	175 23	-
Reading,	-	-	-	-	-	-	-	-	-	-	-	186 48	34 83
Sherborn,	19,870 00	1,105 91	63 00	-	-	-	-	-	-	-	-	212 35	-
Shirley,	5,186 51	242 67	122 22	-	-	-	-	-	-	-	-	215 09	-
Somerville,	-	-	-	-	-	-	-	-	-	-	-	-	-
Stoneham,	-	-	-	-	-	-	-	-	-	-	-	52 73	-
Stow, .	15,797 97	884 00	146 00	-	-	-	-	-	-	-	-	214 43	-
Sudbury,	1,150 00	69 20	122 22	-	-	-	-	-	-	-	-	161 57	-
Tewksbury,	-	-	-	-	-	-	-	-	-	-	-	165 67	-
Townsend,	-	-	-	-	-	-	-	-	-	-	-	171 07	-
Tyngsborough,	2,407 47	121 84	-	-	-	-	-	-	-	-	-	305 14	-
Wakefield,	-	-	-	-	-	-	-	-	-	-	-	78 55	-
Waltham,	-	-	384 41	1	60	-	-	-	-	-	-	167 62	58 91
Watertown,	-	-	-	-	-	-	-	-	-	-	-	64 63	-
Wayland,	200 00	12 00	129 21	-	-	-	-	-	-	-	-	171 00	40 00
Westford,	31,273 11	1,753 50	75 00	1	109	-	-	-	-	-	-	174 97	-
Weston,	-	-	-	-	-	-	-	-	-	-	-	164 17	34 89
Wilmington,	-	-	128 62	-	-	-	-	-	-	-	-	211 38	-
Winchester,	-	-	-	-	-	-	-	-	-	-	-	40 31	-
Woburn,	-	-	-	-	-	-	-	-	-	-	-	150 65	-
Totals, .	\$163,493 00	\$9,273 68,	\$5,252 48	7	617	\$26,147 00	64	6,727	\$75,381 00	\$8,369 15	\$695 93		

NANTUCKET COUNTY.

TOWNS.	Population—U. S. Census, 1880.	Valuation—1884	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The percent. of attendance based upon the average membership.	No. of teachers required by the Public Schools.
Nantucket,	3,727	\$2,683,014	11	540	446	395	—	21	286	387	350	.90	13

NORFOLK COUNTY.

Bellingham,	1,223	\$568,218	8	197	151	237	9	18	151	172	158	.92	8
Braintree, .	3,855	2,863,525	19	693	376	780	2	54	493	627	555	.88	20
Brookline, .	8,057	26,646,500	35	1,409	870	1,681	—	190	870	1,258	1,183	.94	42
Canton, .	4,516	3,353,046	20	906	524	931	5	52	532	751	695	.93	25
Cohasset, .	2,182	3,046,389	13	343	207	430	—	33	224	339	302	.89	14
Dedham, .	6,233	5,048,610	32	1,048	731	1,333	5	80	717	1,081	1,016	.94	33
Dover, .	653	745,255	4	90	56	98	2	2	63	79	69	.87	4
Foxborough,	2,950	1,436,890	11	382	244	466	3	71	392	366	339	.92	12
Franklin, .	4,051	1,937,505	16	784	473	784	9	64	425	598	547	.91	17
Holbrook,	2,130	1,024,530	10	417	283	438	—	21	283	385	359	.93	12
Hyde Park,	7,088	5,059,613	33	1,696	1,036	1,896	—	161	1,094	1,574	1,423	.90	36
Medfield, .	1,371	1,096,660	5	199	117	230	—	22	131	182	162	.89	5
Medway, .	3,956	1,930,135	18	554	330	776	16	77	470	603	531	.88	20
Milton, .	3,206	11,758,050	15	612	367	635	1	45	391	502	471	.94	17
Needham,	5,252	1,826,002	13	517	319	579	11	48	520	466	420	.90	13
Norfolk, .	930	397,906	6	156	89	159	—	9	96	139	124	.89	6
Norwood, .	2,345	1,939,724	11	437	313	503	—	39	325	453	396	.87	12

SCHOOL RETURNS.

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Quincy,	.	10,570	8,098,486	51	2,734	1,876	2,514	3	140	1,351	1,939	1,817	.94	53
Randolph,	.	4,027	2,003,110	16	676	398	736	26	56	411	645	581	.90	17
Sharon,	.	1,492	1,105,635	7	219	140	232	1	19	140	172	152	.88	7
Stoughton,	.	4,875	2,199,800	20	956	598	779	16	48	438	632	556	.88	20
Walpole,	.	2,494	1,546,202	12	431	318	412	2	36	290	404	348	.86	13
Wellesley,	.	-	4,076,492	11	391	245	460	1	72	219	369	334	.90	14
Weymouth,	.	10,570	5,555,194	49	2,041	1,268	2,173	-	159	1,242	1,929	1,714	.89	52
Wrentham,	.	2,481	1,317,591	15	469	260	512	3	36	354	389	388	.99	15
Totals,	.	96,507	\$96,581,068	450	18,357	11,589	19,776	115	1,552	11,622	16,054	14,640	.91	487

NANTUCKET COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school-year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Av'ge wages per month of male teachers in Public Schools.	Av'ge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	HIGH SCHOOLS.						Salary of Principal.
										No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length.		
														Months.	Days.	
Nantucket, .	1	14	2	-	\$100 00	\$27 99	110-10	10	-	1	2	43	Taxation,	10	\$1,000 00	

NORFOLK COUNTY — CONTINUED.

Bellingham, .	1	10	3	-	\$35 00	\$31 62	64	8	-	-	1	106	Taxation,	10	\$1,400 00
Braintree, .	6	22	11	-	77 33	32 81	189	10	-	-	1	132	Taxation,	9-10	2,700 00
Brookline, .	6	38	15	15	194 00	65 00	332-10	9-10	-	-	1	60	Taxation,	10	1,200 00
Canton, .	4	25	-	-	103 33	38 68	200	10	-	-	1	60	Taxation,	10	1,200 00
Cohasset, .	3	12	6	5	73 50	38 73	129-6	9-19	-	-	1	103	Taxation,	10	1,800 00
Dedham, .	6	26	9	9	121 66	45 83	320	10	-	-	1	49	Taxation,	9-5	1,027 78
Dover, .	-	5	1	1	-	39 00	36	9	-	-	1	52	Taxation,	10	1,000 00
Foxborough, .	1	15	2	1	111 11	37 17	100-5	9	-	-	1	81	Taxation,	9-9	1,200 00
Franklin, .	3	17	3	3	44 00	39 84	135-15	8-17	-	-	1	139	Taxation,	10	1,800 00
Holbrook, .	1	19	6	6	100 00	37 27	99-5	9-18	-	-	1	80	Taxation,	10	1,000 00
Hyde Park, .	6	39	-	-	121 66	44 03	327	9-19	-	-	1	55	Taxation,	10	1,060 00
Medfield, .	1	6	3	2	85 00	47 20	47-4	9	-	-	1	36	Taxation,	10	1,000 00
Medway, .	3	23	4	4	55 00	32 42	146-9	8-2	-	-	1	280	Taxation,	10	1,800 00
Milton, .	5	12	4	4	129 00	53 54	150	10	-	-	1	1	Taxation,	10	1,060 00
Needham, .	2	16	6	2	106 00	44 81	124	9-11	-	-	1	-	Taxation,	10	1,165 10
Norfolk, .	1	7	1	1	37 33	31 20	48	8	-	-	1	-	Taxation,	9-10	-
Norwood, .	1	15	8	8	122 00	42 56	104-10	9-10	-	-	1	-	Taxation,	9-10	-

Quincy,	5	48	9	9	108 00	45 20	510	10	-	1	3	152	Taxation,	10	1,400 00
Randolph,	3	15	5	-	119 30	38-79	152	9-10	-	1	2	67	Part tax,	9-10	1,500 00
Sharon,	1	8	-	-	89 47	32 50	63-10	9	-	1	1	40	Taxation,	9-10	850 00
Stoughton,	7	21	13	13	71 42	34 41	174-3	8-15	-	1	2	64	Taxation,	9	1,000 00
Walpole,	7	10	6	6	54 00	32 00	115-5	9-16	-	1	1	35	Taxation,	10	900 00
Wellesley,	2	18	7	4	150 00	50 40	107-5	9-15	-	1	3	64	Taxation,	10	1,500 00
Weymouth,	8	51	8	4	96 00	36 00	520	10	-	2	5	153	Taxation,	10	1,200 00
Wrentham,	5	15	2	-	71 60	34 77	126-5	9	-	1	1	42	Taxation,	9	1,200 00
Totals,	88	493	132	97	\$98 38	\$41 69	4321-12	9-12	-	22	48	1,850	-	204-14	\$28,666 21
															{ 1,500 00 1,200 00 763 33

SCHOOL RETURNS.

lv

Quincy,	32,818 91	-	1,500 00	52 00	5,986 56	-	3,499 42	2,582 11	46,439 00	-
Randolph,	9,402 72	310 00	-	-	710 22	-	393 34	182 37	10,998 65	350 00
Sharon,	2,400 00	170 50	-	24 00	270 95	-	-	145 41	3,010 86	-
Stoughton,	9,305 32	419 23	-	50 00	1,036 44	-	372 26	678 11	11,861 36	-
Walpole,	4,000 00	125 00	-	29 75	693 62	-	-	469 52	5,317 89	-
Wellesley,	9,334 27	225 00	-	-	1,023 68	-	687 95	174 61	11,445 51	-
Weymouth,	26,636 84	383 75	1,845 00	115 00	4,801 47	-	-	1,532 18	35,314 24	-
Wrentham,	6,000 00	417 00	-	71 00	1,035 97	-	964 80	767 16	9,255 93	-
Totals,	\$276,779 08	\$4,965 45	\$10,595 00	\$856 35	\$42,683 28	\$2,706 00	\$13,683 28	\$14,491 53	\$357,859 97	\$514 00

NANTUCKET COUNTY — CONCLUDED.

TOWNS.	Amount of local funds can be appropriated only for the support of Schools and Acade- mies.	Income of local funds.	Income of surplus rev- enue and other funds, including the dog tax, used at the option of the town.	ACADEMIES AND PRIVATE SCHOOLS.						Town's share of school fund payable Jan. 25, 1885.	How much of said fund was used for appa- ratus and books of reference.
				No. of Academies.	Whole No. at- tending for the year.	Amount of tul- tion paid.	No. of Private Schools.	Whole No. at- tending for the year.	Estimated amt of tuition.		
Nantucket, . .	-	-	-	1	75	\$600 00	1	-	-	\$184 46	-

NORFOLK COUNTY — CONCLUDED.

Bellingham, . .	\$418 16	\$25 09	\$254 24	1	70	\$1,350 00	1	-	-	\$214 37	-
Braintree, . .	6,700 00	350 00	466 01	-	-	-	-	-	-	197 40	-
Brookline, . .	-	-	-	-	-	-	-	150	-	-	-
Canton, . .	-	-	-	-	-	-	-	-	-	54 23	-
Cohasset, . .	1,000 00	45 50	207 92	-	-	-	-	-	-	174 64	-
Dedham, . .	1,000 00	60 00	-	-	-	-	2	23	\$870 00	77 05	-
Dover, . .	-	-	79 21	-	-	-	-	-	-	206 05	-
Foxborough, . .	-	-	310 74	-	-	-	-	-	-	176 98	-
Franklin, . .	-	-	327 87	1	169	4,798 25	1	40	275 00	196 95	-
Holbrook, . .	-	-	216 26	-	-	-	-	-	-	181 54	-
Hyde Park, . .	-	-	-	-	-	-	-	-	-	105 47	\$22 10
Medfield, . .	3,750 00	162 00	-	-	-	-	-	-	-	162 48	-
Medway, . .	100 00	6 00	416 01	-	-	-	-	-	-	192 26	-
Milton, . .	-	-	-	-	-	-	1	32	2,300 00	-	-
Needham, . .	1,000 00	-	276 48	-	-	-	-	-	-	181 34	-
Norfolk, . .	-	-	-	-	-	-	-	-	-	310 27	-
Norwood, . .	-	-	-	-	-	-	1	6	250 00	178 48	44 62

SCHOOL RETURNS.

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Quincy,	.	121,000 00	5,789 18	-	1	-	-	1	60	2,000 00	159 04	-
Randolph,	.	12,700 00	1,076 05	-	-	-	-	1	10	150 00	193 37	-
Sharon,	.	2,360 00	141 60	153 00	-	-	-	-	-	-	164 11	-
Stoughton,	.	-	-	-	-	-	-	1	320	-	211 83	-
Walpole,	.	-	-	-	-	-	-	1	16	384 00	175 81	-
Wellesley,	.	-	-	307 23	-	-	-	1	80	4,500 00	25 75	-
Weymouth,	.	6,000 00	275 00	654 00	-	-	-	3	40	400 00	128 29	-
Wrentham,	.	1,818 26	109 08	367 27	-	-	-	-	-	-	177 57	-
Totals,	.	\$157,846 42	\$8,039 50	\$4,036 24	3	239	\$6,148 25	21	777	\$11,129 00	\$3,845 28	\$66 72

PLYMOUTH COUNTY.

TOWNS.	Population—U. S. Census, 1880.	Valuation—1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending, within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attendance based upon the average membership.	No. of teachers required by the Public Schools.
Abington, .	3,697	\$1,875,333	17	601	441	676	—	26	408	649	566	.87	21
Bridgewater, .	3,620	2,065,345	18	555	335	602	1	62	334	546	465	.85	22
Brockton, .	13,608	11,673,476	61	2,864	1,676	3,550	5	218	2,076	2,987	2,684	.90	64
Carver, .	1,039	547,940	8	192	134	218	6	20	124	181	163	.90	8
Duxbury, .	2,196	1,089,489	10	300	182	324	2	28	182	260	237	.91	11
East Bridgewater, .	2,710	1,488,040	15	449	283	538	12	46	304	443	399	.90	16
Halifax, .	542	250,365	4	80	40	74	1	2	36	60	48	.80	4
Hanover, .	1,897	1,090,525	9	333	214	353	—	9	214	294	257	.87	10
Hanson, .	1,309	525,839	7	213	139	234	2	19	139	180	153	.85	7
Hingham, .	4,485	3,298,833	16	669	404	696	2	54	439	603	551	.91	18
Hull, .	383	2,194,172	2	75	40	75	1	7	39	53	47	.89	2
Kingston, .	1,524	1,570,063	6	210	130	254	1	21	130	229	209	.91	6
Lakeville, .	1,008	458,532	8	179	127	194	9	10	121	143	118	.82	8
Marion, .	958	786,860	6	154	100	166	1	10	100	154	128	.83	6
Marshfield, .	1,781	1,022,125	10	228	132	245	1	19	135	215	190	.88	10
Mattapoisett, .	1,365	1,470,804	6	176	95	219	—	31	95	173	150	.87	6
Middleborough, .	5,237	2,723,930	22	807	435	830	4	91	350	755	679	.90	26
Pembroke, .	1,405	626,259	8	200	147	217	1	10	135	175	153	.87	8
Plymouth, .	7,093	4,584,650	33	1,174	851	1,424	—	99	861	1,178	1,043	.89	35
Plympton, .	694	279,479	3	95	61	105	1	5	65	81	69	.85	3
Rochester, .	1,043	457,235	7	179	132	187	3	13	123	142	124	.87	7
Rockland, .	4,553	2,268,290	20	794	570	992	3	87	543	881	794	.90	22
Scituate, .	2,466	1,398,235	13	500	338	495	3	43	331	440	388	.88	15

South Abington,	3,024	2,310,620	12	598	374	668	6	41	343	572	535	.94	13
South Scituate,	1,820	896,199	11	283	169	295	4	20	187	248	197	.79	11
Wareham,	2,896	1,217,924	15	573	368	663	9	45	367	544	492	.90	18
West Bridgewater,	1,665	943,133	10	285	167	308	4	4	167	244	222	.91	10
Totals,	74,018	\$49,113,695	357	12,766	8,084	14,602	82	1,040	8,348	12,430	11,061	.89	387

SUFFOLK COUNTY.

Boston,	362,839	\$682,656,658	514	66,560	2,575	59,228	20	4,833	50,581	55,434	49,316	.89	1,212
Chelsea,	21,782	18,103,497	72	4,464	3,129	4,736	-	321	2,463	3,740	3,395	.91	91
Revere,	2,263	2,983,950	13	604	350	706	-	32	497	498	431	.87	13
Winthrop,	1,043	1,951,170	5	156	134	174	-	9	151	170	149	.88	5
Totals,	387,927	\$705,695,275	604	71,784	6,188	64,844	20	5,195	53,692	59,842	53,291	.89	1,321

PLYMOUTH COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school-year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	A'v'ge wages per month of male teachers in Public Schools.	A'v'ge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	HIGH SCHOOLS.						Salary of Principal.
										No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length.	Months.	
Abington,	5	23	8	5	\$83 00	\$36 28	157	9-5	-	2	4	67	Taxation,	10	10	{ \$1,000 00 1,000 00 1,000 00 1,800 00
Bridgewater,	5	21	17	15	72 00	37 00	169	9	-	1	3	60	Taxation,	9-10	9-10	
Brookton,	13	66	18	14	130 83	38 42	594	9-20	-	1	4	196	Taxation,	10	10	
Carver,	1	9	3	1	32 00	27 25	61	7-14	-	-	-	-	-	-	-	-
Duxbury,	2	13	4	3	62 50	37 67	95-10	9-10	-	1	2	54	Part tax,	10	10	900 00
E. Bridgewater,	3	19	10	10	84 35	32 57	136	9-2	-	1	2	45	Taxation,	10	10	1,000 00
Halifax,	-	7	4	2	-	24 66	32	8	-	-	-	-	-	-	-	-
Hanover,	1	11	3	2	72 00	29 00	87	9-12	-	1	2	57	Taxation,	9-15	9-15	702 00
Hanson,	-	9	5	3	-	31 30	62	8-17	-	-	-	-	-	-	-	-
Hingham,	7	13	8	7	96 00	42 50	160	10	-	1	2	60	Taxation,	10	10	1,600 00
Hull,	2	1	1	1	74 44	32 00	18	9	-	-	-	-	-	-	-	-
Kingston,	1	6	2	1	120 00	39 60	58-10	9-10	1	1	1	34	Taxation,	9-5	9-5	1,110 00
Lakeville,	2	11	6	4	27 00	28 00	61-10	7-14	1	-	-	-	-	-	-	-
Marion,	1	6	2	1	50 00	28 00	48	8	-	-	-	-	-	-	-	-
Marshfield,	2	12	4	2	36 00	27 55	90	9	-	-	-	-	-	-	-	-
Mattapoisett,	2	7	5	3	64 00	34 00	53-17	9	-	1	1	49	Part tax,	8-17	8-17	554 40
Middleborough,	4	39	13	11	102 32	35 00	198	9	-	1	2	72	Taxation,	9-10	9-10	1,200 00
Pembroke,	2	10	3	3	36 00	27 43	66	8-5	-	-	-	-	-	-	-	-
Plymouth,	5	30	10	8	132 50	32 20	326	9-17	-	1	4	150	Taxation,	10	10	1,500 00
Plympton,	-	6	-	-	-	30 00	27	9	-	-	-	-	-	-	-	-
Rochester,	1	15	7	6	28 00	29 58	58-5	8-6	-	-	-	-	-	-	-	-
Rockland,	5	23	7	5	82 00	40 00	179-10	8-19	-	1	3	96	Taxation,	10	10	1,260 00

SCHOOL RETURNS.

Seituate, . . .	1	17	6	105 26	32 65	118	9	-	1	2	69	Taxation,	9-10	1,000 00
South Abington, . .	1	13	4	2 110 00	38 83	100	9-2	-	1	2	78	Taxation,	10	1,100 00
South Situate, . .	2	12	4	- 38 00	26 00	101-15	9-5	-	-	-	-	-	-	-
Wareham, . . .	3	21	3	2 65 26	31 28	118-5	7-9	-	1	2	53	Taxation,	9-5	1,100 00
W. Bridgewater,	-	11	6	-	36 80	80	8	-	-	-	-	-	-	-
Totals, . . .	71	431	163	\$88 18	\$34 16	3,256-2	9-2	2	16	36	1,140	-	144-12	\$17,826 40

SUFFOLK COUNTY -- CONTINUED.

Boston,	143	1,069	750	\$254 26	\$72 95	5,120	10-1	-	11	96	-	Taxation,	10	\$3,780 00
Chelsea,	7	87	21	147 69	53 31	721	10	3	1	7	205	Taxation,	10	3,168 00
Revere,	1	16	8	105 00	40 00	129-10	10	-	-	-	-	-	-	2,880 00
Winthrop,	1	5	1	62 00	35 00	42-15	8-15	1	1	1	30	Taxation,	9-15	2,800 00
														-
														600 00
Totals,	152	1,177	780	\$312 89	\$70 40	6,013-5-	9-19	4	13	104	235	-	29-15	\$13,228 00

PLYMOUTH COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries,—books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Abington, . . .	\$8,800 00	\$287 00	—	\$25 00	\$1,539 51	—	\$2,500 00	\$582 66	\$13,734 17	—
Bridgewater, . .	8,500 00	418 37	—	50 00	1,143 61	—	150 52	100 00	10,362 53	—
Brockton, . . .	32,500 00	568 53	—	—	2,969 50	\$2,959 99	2,709 04	—	41,707 06	—
Carver, . . .	1,200 00	88 76	—	18 50	370 20	—	56 70	143 20	1,877 36	—
Duxbury, . . .	2,800 00	226 00	—	25 00	753 48	—	65 00	251 00	4,120 48	—
E. Bridgewater, .	5,600 00	209 00	\$509 00	35 00	1,153 00	2,500 00	350 00	432 00	10,579 00	—
Halifax, . . .	700 00	—	40 00	15 00	43 93	—	—	10 94	809 87	—
Hanover, . . .	3,300 00	150 00	—	22 75	400 00	—	—	300 00	4,172 75	—
Hanson, . . .	1,600 00	125 00	—	30 00	365 45	—	150 00	41 57	2,312 02	—
Hingham, . . .	11,706 02	—	920 00	—	1,232 82	—	514 69	569 97	14,943 50	—
Hull, . . .	1,000 00	45 00	—	15 00	119 22	—	25 37	3 50	1,208 39	—
Kingston, . . .	3,250 00	200 00	—	25 00	551 37	—	152 86	—	4,182 23	—
Lakeville, . . .	1,800 00	125 00	—	25 00	298 00	—	20 00	5 00	2,273 00	—
Marion, . . .	1,450 00	68 58	—	—	346 24	—	—	40 97	1,905 79	—
Marshfield, . . .	2,500 00	129 00	—	31 00	676 56	—	—	160 85	3,497 41	—
Matapoisett, . .	1,900 00	75 00	—	—	121 94	—	76 38	—	2,173 32	—
Middleborough, .	10,000 00	450 00	—	23 75	1,230 97	—	79 00	335 00	12,118 72	—
Pembroke, . . .	1,750 00	119 00	—	26 00	200 00	—	—	32 30	2,127 30	—
Plymouth, . . .	21,100 00	—	1,350 00	79 00	2,062 80	—	—	1,322 31	25,914 11	—
Plympton, . . .	900 00	50 00	—	22 50	183 59	—	168 15	36 00	1,360 24	—
Rochester, . . .	1,400 00	106 10	—	6 00	354 94	—	—	64 10	1,931 14	—
Rockland, . . .	9,500 00	295 50	—	50 00	1,288 39	—	50 00	333 14	11,517 03	—
Scituate, . . .	4,500 00	154 50	—	30 00	700 00	2,930 78	—	151 93	8,467 21	—

South Abington,	5,000 00	338 00	-	-	1,060 58	-	250 00	500 00	7,148 58
South Scituate, .	2,900 00	120 00	-	25 00	220 00	-	-	125 00	3,390 00
Wareham, .	4,900 00	226 45	-	20 00	1,316 35	-	-	633 19	7,095 99
W. Bridgewater,	3,000 00	-	80 25	-	355 41	-	-	323 61	3,759 27
Totals, .	\$153,556 02	\$4,574 79	\$2,899 25	\$599 50	\$21,060 89	\$8,390 77	\$7,317 71	\$6,498 24	\$204,688 47

SUFFOLK COUNTY — CONTINUED.

Boston, .	\$1,318,360 00	-	\$60,020 00	\$1,800 00	\$125,891 77	\$278,114 05	\$198,059 11	-	\$1,982,244 96
Chelsea, .	56,572 57	-	2,066 67	96 00	5,666 16	12,000 00	10,500 00	-	86,901 40
Revere, .	7,375 00	\$185 00	-	28 00	776 44	-	-	\$765 41	9,129 85
Winthrop, .	2,200 00	75 00	-	10 00	332 52	-	386 50	92 84	3,096 86
Totals, .	\$1,384,507 57	\$260 00	\$62,086 67	\$1,934 00	\$132,666 89	\$290,114 05	\$208,945 61	\$858 25	\$2,081,373 07

South Abington, .	-	-	-	-	-	363 95	-	-	-	-	-	-	-	186 48	-
South Scituate, .	-	-	-	-	-	160 00	-	-	-	-	-	-	-	219 44	-
Wareham, .	-	-	-	-	-	367 80	-	-	-	-	-	-	-	185 63	-
West Bridgewater,	-	-	-	-	-	-	-	-	-	-	-	2	18	219 96	-
Totals, . . .	\$79,852 00	\$1,220 24	\$3,920 41	4	174	\$2,610 50	12	222	\$6,026 00	\$4,867 21	\$263 20				

SUFFOLK COUNTY — CONCLUDED.

Boston, .	\$47,373 22	\$2,964 84	\$53,633 41	22	5,000	\$290,000 00	70	2,250	\$160,000 00	-	-	-	-	-	-
Chelsea, .	-	-	-	-	-	-	3	950	5,000 00	-	-	-	-	-	-
Revere, .	-	-	273 60	-	-	-	-	-	-	\$184 46	-	-	-	-	-
Winthrop, .	-	-	152 60	-	-	-	-	-	-	160 79	-	-	-	-	-
Totals, . . .	\$47,373 22	\$2,964 84	\$54,059 61	22	5,000	\$290,000 00	73	3,200	\$165,000 00	\$345 25	-				

WORCESTER COUNTY.

TOWNS.	Population—U. S. Cen- sus, 1880.	Valuation — 1884.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils of all ages in the Pub- lic Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The percent. of attend- ance based upon the average membership.	No. of teachers required by the Public Schools.
Asburnham,	1,666	\$939,104	13	302	167	336	4	12	217	286	255	.89	13
Athol,	4,307	2,508,007	22	837	496	968	4	95	529	765	710	.93	23
Auburn,	1,317	487,421	7	242	143	282	3	12	161	208	182	.88	7
Barre,	2,419	1,482,055	15	368	216	400	7	58	213	319	284	.89	16
Berlin,	977	483,909	5	179	117	191	4	26	108	161	135	.84	5
Blackstone,	4,907	2,276,922	19	994	612	1,064	9	54	580	774	673	.87	23
Bolton,	903	482,377	7	146	104	179	5	24	96	133	121	.91	7
Boylston,	854	495,450	7	154	99	180	6	18	99	149	134	.90	7
Brookfield,	2,820	1,243,446	14	576	393	724	3	65	410	541	483	.89	14
Charlton,	1,900	965,640	12	281	240	364	15	58	203	270	252	.93	12
Clinton,	8,029	5,125,543	30	1,768	1,093	1,762	3	94	1,087	1,501	1,378	.92	32
Dana,	736	264,892	6	109	79	113	2	10	81	109	94	.86	6
Douglas,	2,241	1,053,427	12	436	374	475	10	26	275	351	298	.85	12
Dudley,	2,803	949,750	12	633	407	523	5	54	281	393	319	.81	13
Fitchburg,	12,429	11,054,378	55	2,793	1,684	3,013	6	226	1,879	2,439	2,223	.91	63
Gardner,	4,988	3,151,753	23	1,378	915	1,196	4	71	717	1,031	853	.83	28
Grafton,	4,030	2,241,223	22	872	573	985	10	42	540	778	675	.87	23
Hardwick,	2,233	1,144,760	15	542	328	578	-	37	320	466	416	.89	15
Harvard,	1,253	904,217	10	154	99	198	5	14	121	149	136	.91	10
Holden,	2,499	1,024,035	14	462	244	576	8	52	403	381	338	.89	16
Hubbardston,	1,386	735,590	10	224	132	278	-	38	133	209	191	.91	10
Lancaster,	2,008	2,171,681	10	319	309	355	2	36	224	274	248	.91	12
Leicester,	2,779	1,713,452	14	602	359	635	3	60	347	502	458	.91	17
Leominster,	5,772	3,813,418	20	952	551	1,050	5	85	531	881	799	.91	25
Lunenburg,	1,101	678,140	8	140	102	172	8	24	102	136	123	.90	8

SCHOOL RETURNS.

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Mendon,	1,094	573,318	8	186	117	218	2	35	116	180	161	.89	8
Millford,	9,310	5,237,390	37	1,710	1,040	1,838	-	172	1,024	1,467	1,392	.95	43
Millbury,	4,741	2,295,414	16	898	541	907	1	58	592	779	728	.93	19
New Braintree,	610	443,965	6	103	82	127	1	20	82	96	89	.94	6
Northborough,	1,676	1,094,876	8	261	181	324	3	23	181	276	248	.90	10
Northbridge,	4,053	2,075,729	16	773	494	856	-	53	516	639	577	.90	16
North Brookfield,	4,459	1,851,273	19	808	587	857	8	64	587	698	639	.92	21
Oakham,	869	350,492	6	129	92	159	3	41	87	128	110	.86	6
Oxford,	2,604	1,338,675	13	356	240	446	2	32	283	331	312	.94	13
Paxton,	592	281,110	4	92	79	112	1	13	79	83	73	.88	4
Petersham,	1,109	573,987	9	154	92	195	7	26	90	153	134	.88	9
Phillipston,	621	263,645	6	89	56	109	1	17	61	82	73	.89	6
Princeton,	1,100	843,888	8	138	86	194	4	40	90	146	137	.94	8
Royalston,	1,192	669,086	10	195	119	234	2	38	119	181	171	.94	10
Rutland,	1,059	502,284	8	196	127	235	4	28	134	178	163	.92	8
Shrewsbury,	1,500	976,505	9	270	168	301	10	43	165	257	235	.91	10
Southborough,	2,142	1,328,941	9	287	180	295	3	21	164	236	198	.84	9
Southbridge,	6,464	3,092,783	23	1,362	857	928	16	75	521	696	622	.88	26
Spencer,	7,466	3,516,210	32	1,764	1,020	1,754	8	84	975	1,474	1,377	.93	36
Sterling,	1,414	886,312	12	224	139	283	-	65	142	214	198	.93	12
Sturbridge,	2,062	975,416	15	378	252	393	10	9	238	368	322	.88	15
Sutton,	3,105	1,305,567	16	530	384	653	10	52	359	463	414	.89	16
Templeton,	2,789	1,098,243	15	532	322	647	7	21	348	468	428	.91	16
Upton,	2,023	866,242	11	312	222	334	6	43	208	305	278	.91	11
Uxbridge,	3,111	1,973,210	18	545	315	591	7	27	287	452	390	.86	18
Warren,	3,889	2,253,186	18	749	438	801	3	57	440	616	561	.91	20
Webster,	5,696	2,135,502	16	1,155	781	739	-	30	530	640	584	.91	17
Westborough,	5,214	2,567,483	21	823	518	993	15	114	526	759	690	.91	23
West Boylston,	2,994	1,094,590	13	578	404	638	15	14	400	472	429	.91	14
West Brookfield,	1,917	814,705	10	353	248	318	13	51	173	247	239	.97	10
Westminster,	1,652	757,525	13	287	165	349	3	29	165	270	251	.93	13
Winchendon,	3,722	1,934,308	18	685	439	734	3	52	530	683	608	.89	19
Worcester,	58,291	50,770,875	220	12,884	9,700	12,698	-	987	9,030	10,143	9,074	.89	254
Totals,	226,897	\$144,133,325	1,045	45,269	30,321	46,862	299	3,725	28,899	37,286	33,683	.90	1,143

WORCESTER COUNTY — CONTINUED.

TOWNS.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school year.	No. of teachers who have attended Normal Schools.	No. of teachers who have graduated from Normal Schools.	Average wages per month of male teachers in Public Schools.	Average wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept during the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.	HIGH SCHOOLS.					Salary of Principal.
										No. of High Schools.	No. of teachers.	No. of pupils.	How supported.	Length. Months.	
Ashburnham,	18	1	1	1	\$126 32	\$29 54	79-7	6-2	1	1	1	41	Taxation,	9	\$700 00
Athol,	28	1	2	1	33 51	33 51	170	7-15	1	1	2	74	Taxation,	9-10	1,200 00
Auburn,	9	2	2	2	30 00	26 50	52-5	7-9	1	1	1	43	Taxation,	9	1,000 00
Barre,	24	3	4	3	58 00	30 00	121	8-6	1	1	2	66	Taxation,	9	1,000 00
Berlin,	10	1	7	5	—	32 40	36-5	7-5	1	1	1	34	Taxation,	9	1,000 00
Blackstone,	24	3	3	2	67 70	30 91	168	8-17	1	1	2	19	Not by tax,	10	600 00
Belton,	7	1	2	2	60 00	29 33	64	9-3	1	1	2	50	Taxation,	9-10	150 00
Boylston,	9	2	3	1	50 00	33 22	49-5	7	1	1	1	86	Taxation,	9-12	1,600 00
Brookfield,	19	2	3	1	94 74	33 35	112-1	8	1	1	1	42	Taxation,	9	600 00
Charlton,	17	2	3	1	38 00	30 80	92	7-13	1	1	2	230	Taxation,	10	1,800 00
Clinton,	39	1	7	3	160 00	43 30	285-10	9-16	1	1	1	74	Taxation,	10	1,200 00
Dana,	6	1	6	1	5 83	5 83	42-10	7-2	1	1	1	89	Taxation,	9	1,066 00
Douglas,	11	3	2	2	50 00	30 50	421	8-6	1	1	1	61	Taxation,	9	750 00
Dudley,	16	3	3	3	57 33	32 00	97-10	8-3	1	1	2	40	Taxation,	9-5	1,300 00
Fitchburg,	73	8	15	12	114 00	40 00	544	9-16	1	1	6	79	Taxation,	10	1,700 00
Gardner,	26	2	5	5	78 00	40 00	173	7-13	1	1	3	85	Taxation,	10	1,500 00
Grafton,	30	1	5	2	118 00	35 77	179-17	7-18	1	1	2	—	—	—	—
Hardwick,	22	5	3	3	35 08	30 69	115-5	7-13	1	1	1	—	—	—	—
Harvard,	11	3	2	1	30 00	29 80	70-5	7-1	1	1	2	—	—	—	—
Holden,	20	5	5	1	55 78	31 60	86-18	6-4	1	1	2	—	—	—	—
Hubbardston,	12	5	1	1	37 44	27 27	74-3	7-8	1	1	1	—	—	—	—
Lancaster,	10	2	1	1	85 77	32 00	80	8	1	1	3	—	—	—	—
Leicester,	13	4	5	4	89 95	37 84	126-5	9	1	1	4	—	—	—	—
Leominster,	23	3	4	3	82 33	37 81	184-1	9-4	1	1	3	—	—	—	—
Lunenburg,	10	2	4	2	23 00	28 00	60	7-10	1	1	1	—	—	—	—

SCHOOL RETURNS.

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Mendon,	1	9	1	-	60 00	24 00	58-10	7-8	-	1	1	32	Taxation, 6	360 00
Milford,	6	49	25	14	88 85	36 00	324-15	8-16	-	1	5	235	Taxation, 10	1,600 00
Milbury,	3	21	8	3	82 60	37 72	142-15	8-18	-	1	2	78	Taxation, 9-15	1,250 00
New Braintree,	-	12	4	3	-	29 42	45	7-10	-	-	-	-	-	-
Northborough,	1	10	3	3	108 10	31 06	69-10	8-14	-	1	1	29	Taxation, 9-5	1,000 00
Northbridge,	1	21	12	12	120 00	42 25	159-5	9-19	-	1	1	30	Taxation, 10	1,200 00
North Brookfield,	2	25	1	-	115 10	35 08	166	8-4	-	1	2	61	Taxation, 10	1,151 00
Oakham,	2	9	-	-	30 00	27 00	40-5	7-10	-	-	-	-	-	-
Oxford,	6	12	1	1	58 66	28 80	106	8-15	-	1	1	49	Taxation, 10	800 00
Paxton,	1	6	4	3	28 00	32 00	25-5	6-6	-	-	-	-	-	-
Petersham,	5	11	2	-	40 80	23 16	65-11	7-5	1	1	1	46	Taxation, 7-10	375 00
Phillipston,	2	6	3	-	31 00	24 00	36-5	6-15	-	-	-	-	-	-
Princeton,	2	9	-	-	41 00	28 00	54	7	-	-	-	-	-	-
Royalston,	-	16	4	-	-	30 28	72-10	7-5	1	-	-	-	-	-
Rutland,	3	8	-	-	38 66	27 00	46	5-4	2	-	-	-	-	-
Shrewsbury,	2	18	6	3	66 50	30 71	73	8-1	-	1	2	56	Taxation, 9	900 00
Southborough,	1	11	9	8	100 00	37 40	81	9	-	1	1	34	Taxation, 9-5	950 00
Southbridge,	3	28	9	6	82 30	36 75	206	9	-	1	3	58	Taxation, 10	1,000 00
Spencer,	5	39	16	10	57 00	35 50	265-15	8-6	-	1	3	105	Taxation, 10	700 00
Sterling,	2	14	1	1	63 55	30 50	87	7-5	1	1	1	64	Taxation, 9-5	900 00
Sturbridge,	-	19	-	-	-	25 97	111	7-8	1	-	-	-	-	-
Sutton,	2	17	-	-	62 44	31 44	113-1	7-1	1	1	1	26	Taxation, 10	800 00
Templeton,	1	20	1	1	115 00	29 95	115	7-12	-	1	2	108	Taxation, 10	1,150 00
Upton,	4	15	6	4	62 50	34 51	85-10	7-14	-	1	2	57	Taxation, 9	900 00
Uxbridge,	2	21	3	2	69 25	32 25	148-5	8-15	1	1	1	31	Taxation, 9-15	1,000 00
Warren,	6	21	6	2	72 50	41 09	140-3	8-7	2	1	2	65	Taxation, 9-5	900 00
Webster,	3	18	3	2	82 25	31 52	136	8-5	-	1	2	53	Taxation, 10	1,100 00
Westborough,	3	27	9	8	75 00	41 00	179	8-4	-	1	3	96	Taxation, 9-15	1,000 00
West Boylston,	1	19	3	3	105 26	33 33	98	7-11	-	1	2	39	Taxation, 9-10	1,000 00
West Brookfield,	2	13	4	2	28 00	31 83	85-10	8	-	-	-	-	-	-
Westminster,	2	15	2	2	49 33	28 33	94-10	7-5	-	1	1	53	Taxation, 9	600 00
Winchendon,	1	22	3	1	100 00	33 75	125	6-19	-	1	2	35	Taxation, 9	900 00
Worcester,	23	231	177	29	130 68	54 04	2,145	10	-	1	16	818	Taxation, 10	2,700 00
Totals,	159	1,279	419	329	\$76 08	\$37 22	9,194-12	8-16	11	41	97	3,421	-	\$42,302 00

WORCESTER COUNTY — CONTINUED.

TOWNS.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries,—books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Ashburnham,	\$3,000 00	\$103 25	—	\$17 60	\$380 25	—	\$142 94	\$11 50	\$3,655 54	—
Athol,	8,000 00	300 00	—	—	1,210 19	—	—	404 66	9,914 85	—
Auburn,	1,300 00	85 00	—	20 00	250 00	—	—	50 00	1,705 00	—
Barre,	4,800 00	232 39	—	30 00	842 72	—	—	309 01	6,214 12	—
Berlin,	1,000 00	66 00	—	9 60	211 40	—	—	305 35	1,592 35	—
Blackstone,	8,000 00	—	\$300 00	60 00	1,657 83	—	1,500 00	508 99	12,026 82	—
Bolton,	1,500 00	101 75	—	11 00	303 00	—	648 00	70 98	2,634 73	—
Boylston,	1,850 00	139 59	—	8 00	239 00	—	—	81 42	2,318 59	—
Brookfield,	5,200 00	145 00	—	34 80	1,010 25	—	120 06	137 37	6,647 48	—
Charlton,	3,000 00	214 47	—	—	604 46	—	129 05	116 42	6,064 40	—
Clinton,	17,573 42	—	1,600 00	36 00	4,270 92	—	4,001 77	369 48	27,851 59	\$72 00
Dana,	700 00	67 25	—	10 00	150 00	—	—	10 00	937 25	—
Douglas,	3,900 00	100 00	—	5 00	532 25	—	604 14	—	5,141 39	—
Dudley,	4,000 00	167 25	—	30 00	600 00	—	—	150 00	4,947 25	—
Fitchburg,	34,966 68	—	2,000 00	72 00	6,386 29	\$8,839 06	6,943 63	2,291 25	61,498 91	—
Gardner,	11,000 00	708 00	—	34 00	2,633 57	4,651 31	2,351 89	—	21,378 77	—
Grafton,	8,223 30	697 00	—	55 00	1,251 12	—	525 00	708 08	11,459 50	—
Hardwick,	3,800 00	—	225 00	22 00	701 56	—	—	1,036 74	5,785 30	—
Harvard,	2,250 00	144 50	—	21 00	453 32	—	—	10 66	2,880 28	—
Holden,	4,014 55	—	200 00	20 00	839 57	3,625 00	300 00	240 46	9,239 58	—
Hubbardston,	2,000 00	146 00	—	35 25	611 34	2,737 80	—	230 57	5,760 96	—
Lancaster,	4,951 64	174 50	—	30 00	676 41	—	—	92 38	5,924 93	—
Leicester,	6,000 00	206 13	—	25 00	861 60	1,658 46	—	540 29	9,291 48	—
Leominster,	12,372 32	—	1,500 00	132 00	500 00	—	385 00	405 02	15,295 09	—
Lunenburg,	1,700 00	80 00	—	20 00	394 00	—	250 00	209 00	2,653 00	—

SCHOOL RETURNS.

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Mendon, .	1,500 00	-	75 00	15 00	396 00	-	149 51	11 17	2,147 47	-
Milford, .	18,560 97	-	1,745 85	30 00	4,809 77	2,645 31	2,385 73	2,045 27	32,222 90	-
Millbury, .	9,000 00	400 00	-	15 00	500 00	-	-	500 00	10,415 00	-
New Braintree,	1,467 02	72 00	-	18 00	139 78	-	-	27 96	1,724 76	-
Northborough, .	3,500 00	159 00	-	9 00	501 54	-	178 51	89 40	4,437 45	-
Northbridge, .	8,800 00	250 00	-	50 00	1,326 24	-	-	714 98	11,141 22	-
No. Brookfield,	7,500 00	275 00	-	5 00	1,292 24	-	-	110 74	9,182 98	-
Oakham, .	950 00	113 50	-	6 00	337 00	-	67 00	25 00	1,498 50	-
Oxford, .	4,500 00	290 00	-	25 00	460 00	-	-	267 41	5,542 41	-
Paxton, .	1,000 00	95 00	-	14 00	162 81	-	-	48 91	1,320 72	-
Petersham, .	1,600 00	170 62	-	7 00	272 40	-	116 40	117 59	2,284 01	-
Phillipston, .	800 00	65 00	-	11 40	185 95	-	-	9 00	1,071 35	-
Princeton, .	1,700 00	105 00	-	6 00	460 82	-	-	25 00	2,296 82	-
Royalston, .	2,000 00	113 00	-	10 00	301 29	-	605 68	12 14	3,042 11	-
Rutland, .	1,197 90	109 00	-	8 00	433 04	-	-	94 62	1,842 56	-
Shrewsbury, .	3,500 00	225 00	-	20 00	709 09	2,741 17	-	236 12	7,431 38	63 20
Southborough, .	4,200 00	150 00	-	11 00	583 00	-	538 39	336 94	5,819 35	-
Southbridge, .	9,500 00	791 25	-	50 00	1,467 55	-	395 45	478 79	12,683 04	-
Spencer, .	14,835 00	-	1,000 00	58 00	1,872 65	12,526 92	557 09	1,483 44	32,333 10	-
Sterling, .	3,400 00	243 75	-	35 00	786 35	-	-	72 35	4,537 45	-
Sturbridge, .	3,400 00	253 74	-	-	582 86	-	73 28	303 92	4,613 80	-
Sutton, .	4,500 00	150 00	-	10 00	569 02	-	-	200 00	5,429 02	-
Templeton, .	4,700 00	147 00	-	23 80	602 77	-	86 77	637 18	6,197 52	-
Upton, .	4,600 00	213 00	-	20 00	505 64	-	-	17 86	5,357 00	358 49
Uxbridge, .	6,300 00	175 00	-	67 00	1,018 38	-	394 84	198 59	8,153 81	-
Warren, .	7,705 11	-	400 00	-	1,403 35	-	-	740 22	10,248 68	-
Webster, .	6,850 00	225 00	-	20 00	859 88	-	-	444 29	8,399 17	-
Westborough, .	10,000 00	1,022 00	-	-	1,309 10	-	425 22	477 30	13,233 62	-
West Boylston, .	4,500 00	150 00	-	20 35	655 78	-	-	442 49	5,768 62	-
West Brookfield, .	3,000 00	157 00	-	22 00	546 97	-	-	90 00	3,815 97	-
Westminster, .	3,000 00	132 43	-	9 50	601 17	-	249 00	139 77	4,132 87	-
Winchendon, .	5,813 13	291 62	-	42 89	750 73	-	71 56	145 49	7,115 42	-
Worcester, .	169,086 66	-	4,250 00	167 66	30,568 26	45,264 91	5,611 44	8,841 03	263,789 96	-
Totals, .	\$488,067 70	\$10,421 99	\$13,295 85	\$1,544 85	\$84,543 48	\$84,689 94	\$29,807 35	\$27,674 60	\$740,049 20	\$493 69

SCHOOL RETURNS.

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Mendon,	-	97 64	-	-	-	-	-	-	250	-	212 16
Milford,	-	-	-	-	-	-	-	-	250	2,000 00	113 79
Milbury,	-	-	-	-	-	-	-	-	8	190 00	-
New Braintree,	-	65 09	-	-	-	-	-	-	-	-	306 63
Northborough,	5,000 00	300 00	-	-	-	-	-	-	1	1,183 00	40 00
Northbridge,	-	212 52	-	-	-	-	-	-	-	-	167 30
North Brookfield,	-	301 18	-	-	-	-	-	-	-	-	202 08
Oakham,	-	115 00	-	-	-	-	-	-	-	-	203 84
Oxford,	-	353 35	-	-	-	-	-	-	-	-	303 78
Paxton,	-	-	-	-	-	-	-	-	-	-	180 82
Petersham,	735 00	186 85	-	-	-	-	-	-	-	-	306 11
Phillipston,	-	47 53	-	-	-	-	-	-	-	-	209 75
Princeton,	-	32 00	-	-	-	-	-	-	-	-	306 05
Royalston,	6,500 00	128 62	-	-	-	-	-	-	-	-	210 73
Rutland,	-	122 60	-	-	-	-	-	-	-	-	212 42
Shrewsbury,	-	-	-	-	-	-	-	-	-	-	312 29
Southborough,	-	118 30	1	60	-	-	-	-	-	1,140 00	217 23
Southbridge,	-	-	-	-	-	-	-	-	25	25 00	168 99
Spencer,	-	-	-	-	-	-	-	-	520	175 00	87 65
Sterling,	-	-	-	-	-	-	-	-	90	24 00	120 16
Sturbridge,	-	-	-	-	-	-	-	-	-	150 00	214 50
Sutton,	2,000 00	156 53	-	-	-	-	-	-	1	24 00	175 10
Templeton,	-	141 85	-	-	-	-	-	-	32	150 00	186 41
Upton,	-	-	-	-	-	-	-	-	-	225 00	184 66
Uxbridge,	-	-	-	-	-	-	-	-	15	250 00	223 15
Warren,	-	-	-	-	-	-	-	-	50	250 00	189 99
Webster,	-	265 53	-	-	-	-	-	-	2	600 00	225 88
Westborough,	-	-	-	-	-	-	-	-	2	175 00	209 10
West Boylston,	-	-	-	-	-	-	-	-	45	180 00	189 86
West Brookfield,	-	-	-	-	-	-	-	-	40	180 00	222 63
Westminster,	-	-	-	-	-	-	-	-	-	180 00	218 40
Winchendon,	-	-	-	-	-	-	-	-	-	2,000 00	194 41
Worcester,	1,504 31	59 61	2	150	4,000 00	9	1,500	90	1,500	2,000 00	-
Totals,	\$228,467 30	\$13,176 37	7	505	\$10,279 00	49	3,179	\$12,322 30	\$11,648 85	\$918 30	

RECAPITULATION.

COUNTIES.	Population—U. S. Census, 1880.	Valuation—1881.	No. of Public Schools.	No. of persons in town May 1, 1884, between 5 and 15 years of age.	No. of persons in town May 1, 1884, between 8 and 14 years of age.	No. of different pupils or all ages in the Public Schools during the school-year.	No. attending within the year under 5 years of age.	No. attending within the year over 15 years of age.	No. attending within the year between 8 and 14 years of age.	Average membership of all the Schools.	Average attendance in all the Public Schools during the school-year.	The per cent. of attendance based upon the average membership.
Barnstable, . . .	28,354*	\$16,678,877	162	5,035	3,374	5,841	6	847	3,486	4,934	4,509	.91
Berkshire, . . .	69,032	36,732,343	373	14,776	9,379	15,915	138	1,200	9,175	12,020	10,707	.89
Bristol, . . .	139,040	114,246,026	558	28,460	17,344	27,783	85	1,530	17,700	21,724	19,635	.90
Dukes, . . .	4,300	3,235,922	23	544	345	655	4	96	306	513	456	.89
Essex, . . .	244,535	179,464,405	858	45,708	27,765	42,529	141	2,743	24,874	37,240	32,828	.88
Franklin, . . .	36,001	16,769,968	262	7,028	4,534	7,604	96	629	4,472	6,296	5,700	.91
Hampden, . . .	104,142	76,786,755	421	21,540	14,371	19,261	168	1,322	11,060	14,246	12,820	.90
Hampshire, . . .	47,232	26,562,650	283	8,692	5,661	9,678	108	830	5,858	7,714	7,005	.91
Middlesex, . . .	317,830	288,196,455	1,940	63,311	39,355	63,969	203	4,768	37,328	51,468	47,270	.92
Nantucket, . . .	3,727	2,683,014	11	540	446	395	—	21	286	387	350	.90
Norfolk, . . .	96,507	96,581,068	450	18,357	11,589	19,776	115	1,552	11,622	16,054	14,640	.91
Plymouth, . . .	74,018	49,113,695	357	12,766	8,084	14,602	82	1,010	8,348	12,430	11,061	.89
Suffolk, . . .	387,927	705,695,275	604	71,784	6,188	64,844	20	5,125	53,692	59,842	53,291	.89
Worcester, . . .	226,897	144,133,325	1,045	45,269	30,321	46,862	299	3,725	28,899	37,286	33,683	.90
Totals, . . .	1,779,542	\$1,756,879,778	6,447	343,810	178,756	339,714	1,465	25,498	217,106	282,154	253,955	.90

* Population of Sandwich and Bourne not included.

RECAPITULATION — CONTINUED.

COUNTIES.	HIGH SCHOOLS.										Salary of Principal.			
	No. of teachers required by the Public Schools.	Whole No. of different male teachers in school-year.	Whole No. of different female teachers in school-year.	No. of teachers who have attended Nor- mal Schools.	No. of teachers who have graduated from Normal Schools.	A'vge wages per month of male teachers in Public Schools.	A'vge wages per month of female teachers in Public Schools.	Aggregate of months all the Public Schools have been kept dur- ing the school-year.	Average No. of months the Public Schools have been kept for the entire year.	No. of Schools kept less than six months each.		No. of High Schools.	No. of teachers.	No. of pupils.
Barnstable,	167	53	156	40	27	\$63 72	\$32 97	1,346-5	8-6	3	10	14	490	\$9,170 00
Berkshire,	432	72	479	50	28	55 48	29 90	3,108-14	8-7	7	12	25	834	12,370 00
Bristol, .	659	64	674	163	134	87 38	44 51	5,245-18	9-8	10	11	36	1,308	13,200 00
Dukes, .	26	7	23	7	6	43 05	26 59	153-83	6-17	-	1	1	29	480 00
Essex, .	1,015	99	1,003	346	278	113 11	43 30	8,098-13	9-9	4	26	86	2,441	33,397 64
Franklin,	270	36	345	40	29	40 87	26 38	1,926-12	7-7	6	5	12	300	3,727 00
Hampden,	488	48	533	144	96	104 12	39 58	3,652-4	8-14	8	10	37	1,011	14,355 00
Hampshire,	305	51	372	42	30	53 19	29 67	2,335-12	8-5	11	13	25	647	9,873 00
Middlesex,	1,464	160	1,481	538	442	123 89	47 42	10,463-10	10-1	12	43	121	4,371	56,233 00
Nantucket,	13	1	14	2	-	100 00	27 99	110-10	10	-	1	2	43	1,000 00
Norfolk, .	487	88	493	132	97	98 38	41 69	4,321-12	9-12	-	22	48	1,850	28,666 21
Plymouth,	387	71	431	163	122	88 18	34 16	3,256-2	9-2	2	16	36	1,140	17,826 40
Suffolk, .	1,321	152	1,177	780	774	312 89	70 40	6,013-5	9-19	4	13	104	235	13,228 00
Worcester,	1,143	159	1,279	419	329	76 08	37 22	9,194-12	8-16	11	41	97	3,421	42,302 00
Totals,	8,177	1,061	8,460	2,866	2,392	\$120 72	\$43 85	59,230-12	9-4	78	224	644	18,120	\$255,828 25

BOARD OF EDUCATION.

RECAPITULATION — CONTINUED.

COUNTIES.	Amount raised by taxes for Schools, including wages of teachers, board, fuel, care of fires and school-rooms, for the school-year 1884-85.	Expense of supervision by school committee.	Salary of Superintendent of Public Schools.	Expense of printing reports, etc.	Expense of sundries,—books, stationery, etc.	Amount expended for new school-houses.	Amount expended for alterations and permanent improvements.	Amount expended for ordinary repairs.	Amount paid for all school purposes from money raised by taxation.	Amount of voluntary contributions for Public Schools.
Barnstable,	\$61,850 00	\$1,448 86	\$1,985 69	\$398 30	\$6,356 68	\$1,000 00	\$2,448 17	\$3,899 69	\$79,395 39	-
Berkshire,	129,643 61	2,776 77	4,050 00	624 63	21,775 15	56,482 53	10,954 03	6,323 81	231,730 28	\$171 00
Bristol,	325,778 75	2,756 19	7,949 42	775 52	34,134 54	117,607 29	10,495 66	21,960 01	521,463 18	94 00
Dukes,	5,710 00	285 00	2 00	85 50	1,098 58	1,113 45	100 00	218 93	8,613 98	-
Essex,	541,250 02	9,450 36	7,525 00	2,135 27	74,252 55	37,326 83	39,480 91	26,076 96	737,498 83	160 00
Franklin,	61,658 66	2,648 47	165 00	429 11	9,141 25	6,269 20	3,581 36	2,315 41	86,211 28	40 10
Hampden,	232,941 08	3,430 81	6,500 00	372 35	28,382 90	43,181 18	8,769 54	11,003 22	335,027 48	90 00
Hampshire,	87,042 64	2,909 27	1,115 00	338 30	13,524 80	7,649 02	3,578 43	4,586 00	120,743 71	42 00
Middlesex,	922,253 68	7,574 50	21,445 00	2,174 04	118,984 73	165,498 36	44,610 95	57,962 48	1,339,641 91	412 62
Nantucket,	4,843 63	100 00	-	21 00	154 66	-	-	74 63	5,193 92	-
Norfolk,	276,779 08	4,965 45	10,595 00	856 35	42,683 28	2,706 00	13,683 28	14,491 53	357,859 97	514 00
Plymouth,	153,556 02	4,574 79	2,899 25	599 50	21,060 89	8,390 77	7,317 71	6,498 24	204,688 47	-
Suffolk,	1,384,507 57	260 00	62,086 67	1,934 00	132,666 89	290,114 05	208,945 61	858 25	2,081,373 07	-
Worcester,	488,067 70	10,421 99	13,295 85	1,544 85	84,543 48	81,689 94	29,807 35	27,674 60	740,049 20	493 69
Totals,	\$1,675,882 44	\$53,602 46	\$139,613 88	\$12,288 72	\$588,760 38	\$822,028 62	\$382,873 00	\$183,943 76	\$6,849,490 67	\$2,017 41

SCHOOL RETURNS.

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RECAPITULATION - CONCLUDED

COUNTIES.	Amount of local funds the income of which can be appropriated only for the support of Schools and Academies.	Income of local funds.	Income of surplus revenue and other funds, including the dog tax, used at the option of the town.	ACADEMIES AND PRIVATE SCHOOLS.						Town's share of school fund payable Jan. 25, 1885.	How much of said fund was used for apparatus and books of reference.
				No. of Academies.	Whole No. attending for the year.	Amount of tuition paid.	No. of Private Schools.	Whole No. attending for the year.	Estimated amount of tuition.		
Barnstable,	\$11,233 00	\$2,119 32	\$1,171 62	1	59	\$774 00	2	25	\$210 00	\$3,186 03	\$51 00
Berkshire,	17,758 00	1,255 37	1,704 07	2	45	1,250 00	17	394	24,480 00	8,336 92	439 81
Bristol,	163,800 00	11,411 99	4,364 13	3	297	17,350 00	38	2,002	14,697 00	3,009 96	119 66
Dukes,	5,000 00	200 00	111 30	1	25	125 00	-	-	-	1,487 45	36 25
Essex,	474,067 58	18,700 20	6,739 21	5	644	29,345 30	52	4,765	27,523 00	4,843 80	184 20
Franklin,	70,704 83	3,670 99	1,094 72	5	668	13,981 31	5	182	7,945 57	6,889 58	182 30
Hampden,	159,562 87	8,396 56	2,605 81	3	476	14,256 41	18	3,954	24,165 00	4,997 35	252 46
Hampshire,	385,627 93	21,145 96	1,480 12	5	522	58,379 26	13	199	6,127 00	5,961 48	113 08
Middlesex,	163,493 00	9,273 68	5,252 48	7	617	26,147 00	64	6,727	75,381 00	8,369 15	695 93
Nantucket,	-	-	-	1	75	600 00	-	-	-	184 46	-
Norfolk,	157,846 42	8,039 50	4,036 24	3	239	6,148 25	21	777	11,129 00	3,845 28	66 72
Plymouth,	79,852 00	4,220 24	3,920 41	4	174	2,610 50	12	222	6,026 00	4,867 21	263 20
Suffolk,	47,373 22	2,964 84	54,059 61	22	5,000	290,000 00	73	3,200	165,000 00	345 25	-
Worcester,	228,467 30	13,176 37	4,906 84	7	505	10,279 00	49	3,179	12,322 30	11,648 85	918 30
Totals,	\$1,994,786 15	\$104,575 02	\$91,446 56	69	9,346	\$471,246 03	364	25,626	\$375,005 87	\$67,972 77	\$3,322 91

EVENING SCHOOLS.

CITIES AND TOWNS.	No. of Schools.	ATTENDANCE.			TIME.		No. of Teachers.	Expense.
		Males.	Females.	Average.	No. of Evenings.			
Adams, . . .	3	140	30	81	28	5	\$170	25
Boston, . . .	19	3,148	*	2,749	1,719	128	47,537	90
Brockton, . . .	6	200	158	232	91	6	624	30
Brookline, . . .	1	26	12	23	50	2	384	85
Cambridge, . . .	6	585	176	281	50	14	2,202	92
Chelsea, . . .	2	300	*	150	52	9	850	00
Chicopee, . . .	2	456	*	219	40	32	1,582	37
Dalton, . . .	1	-	-	-	30	4	243	62
Dedham, . . .	1	60	20	42	60	3	600	00
Fall River, . . .	21	1,150	235	647	80	46	3,500	00
Fitchburg, . . .	2	100	6	28	50	5	700	00
Haverhill, . . .	3	265	238	253	89	13	1,510	00
Holyoke, . . .	9	563	245	360	348	23	1,335	29
Hyde Park, . . .	1	112	42	50	110	6	555	40
Lawrence, . . .	12	320	86	350	492	25	1,273	25
Lowell, . . .	8	1,403	736	841	595	66	8,011	15
Lynn, . . .	1	415	139	333	47	45	2,984	38
Malden, . . .	2	126	*	91	110	5	1,342	01
Milford, . . .	2	47	6	41	72	2	529	56
Montague, . . .	2	47	*	72	69	3	251	09
New Bedford, . . .	3	385	234	128	95	15	1,680	09
Newburyport, . . .	1	18	25	35	-	5	125	75
Newton, . . .	1	60	50	62	45	7	619	09
North Adams, . . .	4	123	81	137	40	5	500	00
Pittsfield, . . .	1	115	11	40	62	4	493	25
Salem, . . .	3	390	144	162	122	14	1,126	00
Spencer, . . .	1	-	-	148	51	6	402	94
Springfield, . . .	2	399	131	183	85	18	1,928	00
Stoneham, . . .	1	39	11	27	23	3	169	50
Sutton, . . .	1	51	40	33	40	1	48	75
Taunton, . . .	2	239	100	120	64	11	1,310	00
Waltham, . . .	3	249	176	105	160	9	1,046	91
Warren, . . .	2	-	-	-	24	5	106	18
Warwick, . . .	1	14	16	-	50	1	110	00
Westfield, . . .	1	65	42	30	40	5	267	00
Winchester, . . .	1	85	29	43	40	24	125	00
Woburn, . . .	1	55	30	35	50	4	298	00
Worcester, . . .	9	354	69	316	78	42	3,579	79
Totals, . . .	142	12,104	3,318	8,447	5,251	621	\$90,124	59

* With males.

SCHOOL RETURNS.

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RETURNS OF SCHOOLS IN STATE INSTITUTIONS FOR THE YEAR ENDING JULY 31, 1885.

STATE INSTITUTIONS.	No. of Schools in the Institution.	No. of different Scholars of all ages during the year.	Average attendance during the year.	No. under 5 years of age attending School.	No. over 15 years of age attending School.	No. between 5 and 15 years of age remaining in the Institution July 31, 1885.	NO. OF TEACHERS DURING THE YEAR.		WAGES OF TEACHERS PER MONTH.		Length of each School in Months.
							Males.	Females.	Males.	Females.	
State Industrial School at Lancaster, .	3	149	65	-	47	18	-	3	-	\$25 00*	12 months.
State Primary School at Monson, .	8	557	388	27	10	317	-	8	-	20 83	11 months.
Lyman School for Boys at Westborough,	4	166	127.5	-	15	72	2	8	\$33 00	25 00*	12 months.

* With board.

GRADUATED TABLES—FIRST SERIES.

The following Table shows the sums appropriated by the several cities and towns in the State, for the education of each child between five and fifteen years of age. The income of the surplus revenue and of other funds held in a similar way, when appropriated to schools, is added to the sum raised by taxes; and these sums constitute the amount reckoned as appropriations. The income of such school funds as were given and are held on the express condition that their income shall be appropriated to schools, is not included. Such an appropriation to their income, being necessary to retaining the funds, is no evidence of the liberality of those holding the trust. But if a town appropriates the income of any fund to its public schools, which may be so appropriated or not, at the option of the voters, or when the town has a legal right to use such income in defraying its ordinary expenses, then such an appropriation is as really a contribution to common schools as an equal sum raised by taxes. On this account the surplus revenue, and sometimes other funds, are to be distinguished from local school funds as generally held. The income of the one *may* be appropriated to schools, or not, at the pleasure of the town; the income of the other *must* be appropriated to schools by the condition of the donation. Funds of the latter kind are usually donations made to furnish means of education in addition to those provided by a reasonable taxation. Committees are expected, in their annual returns, to make this distinction in relation to school funds.

Voluntary contributions are not included in the amount which is divided in order to ascertain the sum appropriated to each child. In many towns such contributions, however liberal, are not permanent, and cannot be relied upon as a stated provision. They are often raised and applied to favor particular schools, or classes of scholars, and not to benefit equally all that attend the public schools. Besides, the value of board and fuel gratuitously furnished is determined by the mere estimate of individuals, and is therefore uncertain; while the amount raised by taxes, being in money, has a fixed and definite value, and is a matter of record. Still the contributions voluntarily made are exhibited in a separate column of the Table, as necessary to a complete statement of the provision made by the towns for the education of their children.

The Table exhibits the rank of each city or town in the State, in respect to its liberality in the appropriation of money to its schools, as compared with other cities and towns for the year 1884-85, also its rank in a similar scale for 1883-84. It presents the sum appropriated to each child between five and fifteen.

GRADUATED TABLES — (FOR THE STATE) — FIRST SERIES.

Table showing the Comparative Amount of Money appropriated by the different Towns in the State for the Education of each Child in the Town, between the Ages of 5 and 15 Years.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
8	1	BROOKLINE,	\$29 37 1	\$41,384 00	-	\$41,384 00	1,409	-
1	2	Nahant,	27 79.6	3,891 39	-	3,891 39	140	-
3	3	Wellesley,	24 65.9	9,334 27	\$307 23	9,641 50	391	-
4	4	Newton,	24 05.3	86,283 12	1,581 88	87,865 00	3,653	-
2	5	Milton,	23 65.1	14,474 62	-	14,474 62	612	-
7	6	Concord,	22 69.2	11,800 00	-	11,800 00	520	-
13	7	Dedham,	21 75.6	22,800 00	-	22,800 00	1,048	-
6	8	Arlington,	21 39	20,000 00	-	20,000 00	935	-
9	9	Belmont,	21 19.9	6,359 82	-	6,359 82	300	-
29	10	Falmouth,	20 79.4	6,600 00	199 74	6,799 74	327	-
10	11	Boston,	20 61.3	1,318,360 00	53,633 41	1,371,993 41	66,560	-
5	12	Lexington,	20 38.8	8,400 00	-	8,400 00	412	\$125 00
11	13	Winchester,	19 92.8	13,570 69	-	13,570 69	681	-
14	14	Weston,	19 14.9	4,500 00	-	4,500 00	235	-
18	15	Norwood,	18 99.3	8,300 00	-	8,300 00	437	-
38	16	Waltham,	18 65.1	41,264 18	384 41	41,648 59	2,233	-
30	17	Cohasset,	18 39	6,100 00	207 92	6,307 92	343	-
16	18	Medford,	18 22	26,181 46	-	26,181 46	1,437	-

Showing the Comparative Amount of Money appropriated by the different Towns in the State — Continued.

For 1883-84.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age	Amount contributed for board and fuel.
20	Barnstable, .	\$18 19.7	\$11,000 00	\$282 04	\$11,282 04	620	-
114	Plymouth, .	17 97.3	21,100 00	-	21,100 00	1,174	-
12	Swampscott, .	17 58.8	6,789 13	-	6,789 13	386	-
17	Hingham, .	17 49.8	11,706 02	-	11,706 02	669	-
23	Watertown, .	17 04.5	17,505 00	-	17,505 00	1,027	-
95	Holbrook, .	16 82.6	6,800 00	216 26	7,016 26	417	-
22	Groton, .	16 44.7	5,000 00	-	5,000 00	304	-
58	Dover, .	16 43.6	1,400 00	79 21	1,479 21	90	-
28	Kingston, .	16 28.4	3,250 00	169 59	3,419 59	210	-
55	Acton, .	16 19.8	4,000 00	260 00	4,260 00	263	-
35	Haverhill, .	16 12.7	57,128 17	430 00	57,558 17	3,569	-
53	Bridgewater, .	16 04.4	8,500 00	404 64	8,904 64	555	-
-	Bourne, .	16 03.1	3,350 00	225 00	3,575 00	223	-
27	Stoneham, .	15 93.1	14,035 00	-	14,035 00	881	-
19	Needham, .	15 81.5	7,900 00	276 48	8,176 48	517	-
34	Cambridge, .	15 76.1	168,357 08	-	168,357 08	10,682	\$214 50
24	Lancaster, .	15 52.2	4,951 64	-	4,951 64	319	-
101	Stockbridge, .	15 48	5,000 00	-	5,000 00	323	-
15	New Bedford, .	15 31.5	77,887 75	694 46	78,582 21	5,131	-
62	North Reading, .	15 28.8	1,900 00	133 28	2,033 28	133	-
31	Sterling, .	15 17.9	3,400 00	-	3,400 00	224	-
65	Winthrop, .	15 08.1	2,200 00	152 60	2,352 60	156	-
32	Southborough, .	15 04.6	4,206 00	118 30	4,318 30	287	-
122	Littleton, .	15 01.5	2,400 00	212 61	2,612 61	174	14 12
43	New Braintree, .	14 87.5	1,467 02	65 09	1,532 11	103	-
33	Framingham, .	14 78.8	18,000 00	336 75	18,336 75	1,240	-

SCHOOL RETURNS.

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107	45	Upton,	.	.	.	14 74.4	4,600 00	-	4,600 00	312	358 49
116	46	Abington,	.	.	.	14 64.2	8,800 00	-	8,800 00	601	-
39	47	Harvard,	.	.	.	14 61	2,250 00	-	2,250 00	154	-
54	48	Wellfleet,	.	.	.	14 54.5	4,000 00	-	4,000 00	275	-
52	49	Springfield,	.	.	.	14 28.8	94,055 00	-	94,055 00	6,583	-
48	50	Hyde Park,	.	.	.	14 15.1	24,000 00	-	24,000 00	1,696	-
339	51	Barnardston,	.	.	.	14 08	2,000 00	112 00	2,112 00	150	-
42	52	Reading,	.	.	.	14 01.4	8,100 00	-	8,100 00	578	-
82	53	Natick,	.	.	.	14 00.4	22,000 00	-	22,000 00	1,571	44 00
73	54	Randolph,	.	.	.	13 90.9	9,402 72	-	9,402 72	676	350 00
61	55	Foxborough,	.	.	.	13 90.2	5,000 00	310 74	5,310 74	382	-
44	56	Woburn,	.	.	.	13 82.9	33,480 00	-	33,480 00	2,421	-
79	57	Greenfield,	.	.	.	13 80.8	11,350 00	-	11,350 00	822	-
41	58	Granby,	.	.	.	13 80.1	1,800 00	63 19	1,863 19	135	-
67	59	Malden,	.	.	.	13 76.7	39,180 30	-	39,180 30	2,846	-
56	60	South Hadley,	.	.	.	13 74.4	8,828 20	173 89	9,002 09	655	-
26	61	Melrose,	.	.	.	13 69.3	15,500 00	-	15,500 00	1,132	-
57	62	Sandwich,	.	.	.	13 66.8	5,100 00	162 23	5,262 23	385	-
51	63	Everett,	.	.	.	13 64.8	13,170 00	-	13,170 00	965	-
201	64	Oxford,	.	.	.	13 63.3	4,500 00	353 35	4,853 35	356	-
75	65	Westfield,	.	.	.	13 63.1	20,700 00	523 71	21,223 71	1,557	-
100	66	Wrentham,	.	.	.	13 57.6	6,000 00	367 27	6,367 27	469	-
49	67	Salem,	.	.	.	13 51.4	68,085 82	2,351 00	70,436 82	5,212	-
90	68	Barre,	.	.	.	13 51.1	4,800 00	172 03	4,972 03	368	-
46	69	Wayland,	.	.	.	13 49.6	4,500 00	129 21	4,629 21	343	-
165	70	Amesbury,	.	.	.	13 49	7,551 37	178 50	7,729 87	573	-
76	71	Ashby,	.	.	.	13 48	1,900 00	95 00	1,995 00	148	-
111	72	Lincoln,	.	.	.	13 45	2,300 00	-	2,300 00	171	-
47	73	Somerville,	.	.	.	13 44.9	81,124 00	-	81,124 00	6,032	-
69	74	Northborough,	.	.	.	13 41	3,500 00	-	3,500 00	261	-
50	75	Canton,	.	.	.	13 38	12,122 40	-	12,122 40	906	-
45	76	Weymouth,	.	.	.	13 37.1	26,636 84	654 00	27,290 84	2,041	-

Showing the Comparative Amount of Money appropriated by the different Towns in the State — Continued.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount Contributed for board and fuel.
59	135	Petersham,	\$11 60.3	\$1,600 00	\$186 85	\$1,786 85	154	-
174	136	Brockton,	11 56	32,500 00	607 10	33,107 10	2,864	-
158	137	Uxbridge,	11 56	6,300 00	-	6,300 00	545	-
306	138	Windsor,	11 51	800 00	74 74	874 74	76	-
200	139	Wilmington,	11 41.2	1,800 00	128 62	1,928 62	169	-
180	140	Dalton,	11 34.8	4,743 62	-	4,743 62	418	-
115	141	Sudbury,	11 28.8	2,000 00	122 22	2,122 22	188	-
166	142	West Springfield,	11 21.9	9,200 00	280 33	9,480 33	845	-
179	143	Northampton,	11 20.4	26,700 00	-	26,700 00	2,383	-
120	144	Easton,	11 14.8	8,332 00	386 70	8,918 70	800	-
126	145	Wenham,	11 12.6	1,400 00	90 89	1,490 89	134	-
144	146	Bradford,	11 11.4	5,412 76	-	5,412 76	487	-
150	147	Yarmouth,	11 11.1	3,500 00	-	3,500 00	315	-
105	148	Swanséa,	11 06.2	2,500 00	-	2,500 00	226	\$69 00
125	149	Lakeville,	11 01.9	1,800 00	172 35	1,972 35	179	-
128	150	Marlborough,	10 92	22,900 00	33 00	22,933 00	2,100	-
133	151	Royalston,	10 91.6	2,000 00	128 62	2,128 62	195	-
153	152	Holliston,	10 90.2	5,800 00	-	5,800 00	532	-
146	153	Marblehead,	10 90	14,520 67	420 75	14,941 42	1,371	-
152	154	Paxton,	10 87	1,000 00	-	1,000 00	92	-
135	155	Milford,	10 85.4	8,560 97	-	8,560 97	1,710	-
162	156	South Scituate,	10 81.3	2,900 00	160 00	3,060 00	283	-
187	157	Pittsfield,	10 80.1	31,000 00	-	31,000 00	2,870	-
177	158	Mattapoisett,	10 79.5	1,900 00	-	1,900 00	176	-
189	159	Essex,	10 77.6	3,000 00	71 10	3,071 10	285	-
118	160	Andover,	10 77.1	9,500 00	-	9,500 00	882	-

SCHOOL RETURNS.

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196	161	Manchester,	.	.	10 75.7	2,700 00	-	2,700 00	251	-
243	162	Lee, .	.	.	10 72.5	8,473 08	-	8,473 08	790	96 00
277	163	Charlton, .	.	.	10 67.6	3,000 00	-	3,000 00	281	72 00
265	164	Maynard, .	.	.	10 63.8	5,000 00	-	5,000 00	470	-
112	165	Mashpee, .	.	.	10 59.5	500 00	50 94	550 94	52	-
192	166	West Bridgewater,	.	.	10 52.6	3,000 00	-	3,000 00	285	-
147	167	Orange, .	.	.	10 49.2	6,505 00	-	6,505 00	620	-
169	168	Leicester, .	.	.	10 47.3	6,000 00	304 80	6,304 80	602	-
159	169	Plympton, .	.	.	10 47.1	900 00	94 70	994 70	95	-
154	170	Westminster, .	.	.	10 45.3	3,000 00	-	3,000 00	287	-
185	171	Granville, .	.	.	10 45.1	2,000 00	403 82	2,403 82	230	-
173	172	Ashburnham, .	.	.	10 43	3,000 00	149 80	3,149 80	302	-
172	173	Bellingham, .	.	.	10 42.8	1,800 00	254 24	2,054 24	197	-
141	174	Great Barrington,	.	.	10 42.5	8,500 00	257 02	8,757 02	840	-
163	175	Pepperell, .	.	.	10 37.7	4,400 00	-	4,400 00	424	-
140	176	Townsend, .	.	.	10 32.5	3,500 00	-	3,500 00	339	-
164	177	Easthampton, .	.	.	10 32.4	8,150 00	150 89	8,300 89	804	-
178	178	Hanover, .	.	.	10 30.6	3,300 00	131 96	3,431 96	333	-
195	179	Tisbury, .	.	.	10 30	2,000 00	59 93	2,059 93	200	-
130	180	Warren, .	.	.	10 28.7	7,705 11	-	7,705 11	749	-
167	181	Fall River, .	.	.	10 27.5	120,907 04	-	120,907 04	11,767	-
132	182	Bolton, .	.	.	10 27.4	1,500 00	-	1,500 00	146	-
242	183	Duxbury, .	.	.	10 22.7	2,800 00	268 15	3,068 15	300	-
129	184	Lawrence, .	.	.	10 14.8	72,829 21	-	72,829 21	7,177	-
319	185	Ludlow, .	.	.	10 14.5	3,500 00	-	3,500 00	345	-
225	186	Cummington, .	.	.	10 13.5	1,200 00	26 29	1,226 29	121	-
231	187	Enfield, .	.	.	10 11.9	1,700 00	-	1,700 00	168	-
254	188	Shirley, .	.	.	10 10.6	2,000 00	122 22	2,122 22	210	-
212	189	Marion, .	.	.	10 10.2	1,450 00	105 72	1,555 72	154	-
203	190	Millbury, .	.	.	10 02.2	9,000 00	-	9,000 00	898	-
25	191	Greenwich, .	.	.	9 98.3	800 00	38 59	838 59	84	-
160	192	Boxford, .	.	.	9 95.5	1,200 00	163 77	1,363 77	137	160 00

Showing the Comparative Amount of Money appropriated by the different Towns in the State — Continued.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
184	193	Clinton,	\$9 94	\$17,573 42	-	\$17,573 42	1,768	-
264	194	Harwich,	9 94	5,000 00	-	5,000 00	503	-
168	195	Dennis,	9 92.6	5,000 00	\$72 10	5,072 10	511	-
228	196	Palmer,	9 92.4	11,400 00	260 74	11,660 74	1,175	-
230	197	Ayer,	9 92	4,000 00	116 98	4,116 98	415	-
123	198	Chicopee,	9 90.8	21,650 00	-	21,650 00	2,185	-
227	199	Northfield,	9 87.4	2,200 00	239 00	2,439 00	247	-
345	200	Sandisfield,	9 85.2	2,000 00	29 47	2,029 47	206	-
221	201	Athol,	9 82.3	8,000 00	221 62	8,221 62	837	-
161	202	Dighton,	9 78.8	2,800 00	155 83	2,955 83	302	\$50 00
191	203	Burlington,	9 78.1	1,100 00	103 01	1,203 01	123	-
127	204	Stoughton,	9 73.4	9,305 32	-	9,305 32	956	-
211	205	New Salem,	9 72.8	1,200 00	35 50	1,235 50	127	-
175	206	Dracut,	9 68.7	3,000 00	196 62	3,196 62	330	-
220	207	North Brookfield,	9 65.5	7,500 00	301 18	7,801 18	808	-
250	208	Sheffield,	9 65.2	3,700 00	247 73	3,947 73	409	-
151	209	Ipswich,	9 62.3	6,100 00	164 77	6,264 77	65	-
143	210	Berkley,	9 61.5	1,500 00	-	1,500 00	156	-
207	211	Hudson,	9 58.5	8,000 00	175 76	8,175 76	853	-
204	212	Warwick,	9 58.5	1,151 17	-	1,151 17	120	-
253	213	Freetown,	9 57.6	2,000 00	183 26	2,183 26	228	-
134	214	Monson,	9 57	5,500 00	184 59	5,684 59	594	-
215	215	Huntington,	9 56.7	1,700 00	79 37	1,779 37	186	-
181	216	Truro,	9 54.4	1,500 00	46 12	1,546 12	162	-
219	217	Phillipston,	9 52.3	800 00	47 53	847 53	89	-
245	218	Middleton,	9 51.9	1,200 00	75 52	1,275 52	134	-

SCHOOL RETURNS.

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121	219	Penn, .	9 51.1	600 00	18 21	618 21	65
202	220	Acushnet, .	9 51	1,700 00	116 48	1,816 48	191
269	221	Eastham, .	9 46.1	800 00	51 45	851 45	90
149	222	Grafton, .	9 43	8,223 30	-	8,223 30	872
193	223	Salisbury, .	9 39	7,500 00	274 62	7,774 62	828
238	224	Seituate, .	9 38	4,500 00	190 00	4,690 00	500
239	225	Hopkinton, .	9 36 8	7,000 00	372 48	7,372 48	787
232	226	Brookfield, .	9 31.6	5,200 00	165 83	7,365 83	576
87	227	Walpole, .	9 28.1	4,000 00	-	4,000 00	431
266	228	Ashfield, .	9 24.6	1,600 00	64 30	1,664 30	180
261	229	Stow, .	9 23	1,700 00	146 00	1,846 00	200
198	230	Wareham, .	9 19.3	4,900 00	367 80	5,267 80	573
223	231	Holden, .	9 18.7	4,014 55	229 89	4,244 44	462
217	232	Westford, .	9 16 7	3,500 00	75 00	3,575 00	390
275	233	Brimfield, .	9 14.3	1,600 00	-	1,600 00	175
199	234	Lenox, .	9 13.1	4,100 00	-	4,100 00	449
234	235	Westhampton, .	9 10.7	1,000 00	29 05	1,029 05	113
229	236	Templeton, .	9 10.1	4,700 00	141 85	4,841 85	532
208	237	Ware, .	9 09.1	9,200 00	-	9,200 00	1,012
226	238	Provincetown, .	9 07	7,800 00	-	7,800 00	860
176	239	Chatham, .	9 04.9	3,300 00	48 00	3,348 00	370
214	240	Hawley, .	9 00.9	1,000 00	-	1,000 00	111
256	241	Sturbridge, .	8 99.5	3,400 00	-	3,400 00	378
206	242	South Abington, .	8 97	5,000 00	363 95	5,363 95	598
222	243	Nantucket, .	8 97	4,843 63	-	4,843 63	540
279	244	Douglas, .	8 94.5	3,900 00	-	3,900 00	436
282	245	Hubbardston, .	8 92.9	2,000 00	-	2,000 00	224
247	246	Deerfield, .	8 91.4	5,500 00	-	5,500 00	617
183	247	Hampden, .	8 89.1	1,400 00	67 00	1,467 00	165
248	248	Groveland, .	8 88.3	3,500 00	-	3,500 00	394
313	249	Erving, .	8 79.9	1,200 00	58 20	1,258 20	143
273	250	Sutton, .	8 78.6	4,500 00	156 53	4,656 53	530

BOARD OF EDUCATION.

Showing the Comparative Amount of Money appropriated by the different Towns in the State — Continued.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
188	251	Halifax,	\$8 75	\$700 00	-	\$700 00	80	-
272	252	Pembroke,	8 75	1,750 00	-	1,750 00	200	-
287	253	Wilbraham,	8 69.8	2,200 00	\$96 38	2,296 38	264	-
308	254	Somerset,	8 69.4	3,851 96	260 48	4,112 44	473	-
197	255	Wendell,	8 66.4	700 00	27 75	727 75	84	-
235	256	Topsfield,	8 63.2	1,400 00	119 16	1,519 16	176	-
288	257	Mendon,	8 58.9	1,500 00	97 64	1,597 64	186	-
224	258	Southampton,	8 55.6	1,450 00	64 46	1,514 46	177	-
205	259	Westport,	8 55.1	4,000 00	250 04	4,250 04	497	-
237	260	Ashland,	8 52.4	4,100 00	-	4,100 00	481	-
240	261	West Brookfield,	8 49.9	3,000 00	-	3,000 00	353	-
258	262	Sunderland,	8 48.6	1,200 00	56 00	1,256 00	148	-
260	263	Winchendon,	8 48.6	5,813 13	-	5,813 13	685	-
284	264	Rochester,	8 47.3	1,400 00	116 73	1,516 73	179	-
218	265	Franklin,	8 45.4	6,300 00	327 87	6,627 87	784	-
305	266	Spencer,	8 41	14,835 00	-	14,835 00	1,764	-
280	267	Rockport,	8 40.5	6,741 00	-	6,741 00	802	-
310	268	Otis,	8 38.2	1,000 00	47 69	1,047 69	125	-
286	269	Cheshire,	8 36.9	2,500 00	77 50	2,577 50	308	-
236	270	Seekonk,	8 34.9	1,700 00	195 16	1,895 16	227	-
233	271	Belchertown,	8 31.7	4,000 00	208 24	4,208 24	506	-
252	272	Newburyport,	8 26.3	22,000 00	202 62	22,202 62	2,687	-
304	273	Oakham,	8 25.6	950 00	115 00	1,065 00	129	-
270	274	Holyoke,	8 25.4	46,361 08	-	46,361 08	5,617	-
291	275	Gardner,	8 24.1	11,000 00	356 45	11,356 45	1,378	-
262	276	Blackstone,	8 23.9	8,000 00	189 08	8,189 08	991	-

SCHOOL RETURNS.

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210	277	Dartmouth, .	8	23.3	4,500 00	258 84	4,758 84	573	\$25 00
289	278	Southwick, .	8	20.8	1,500 00	100 47	1,600 47	195	-
263	279	Conway, .	8	19.7	2,500 00	-	2,500 00	305	-
244	280	Rowley, .	8	18.4	1,774 75	74 88	1,849 63	226	-
257	281	Hanson, .	8	10.8	1,600 00	126 96	1,726 96	213	-
302	282	Chilmark, .	8	03.6	450 00	-	450 00	56	-
249	283	Blandford, .	8	02.6	1,500 00	73 14	1,573 14	196	-
216	284	Tyringham, .	7	97.6	700 00	33 78	733 78	92	-
332	285	Hatfield, .	7	96.9	2,300 00	50 89	2,350 89	295	-
301	286	Plainfield, .	7	96	500 00	17 38	517 38	65	-
276	287	Adams, .	7	95.4	12,995 47	207 66	13,203 13	1,660	-
271	288	Williamstown, .	7	92.7	5,200 00	-	5,200 00	656	-
281	289	Billerica, .	7	90.8	3,000 00	-	3,000 00	379	-
324	290	Chester, .	7	89.7	1,600 00	137 34	1,737 34	220	-
278	291	Monterey, .	7	88.4	800 00	83 00	883 00	112	-
297	292	Hancock, .	7	84.3	800 00	-	800 00	102	-
285	293	Hadley, .	7	83.5	2,750 00	-	2,750 00	351	-
294	294	Charlemont, .	7	81.4	1,100 00	48 65	1,148 65	147	-
293	295	West Boylston, .	7	78.6	4,500 00	-	4,500 00	578	-
182	296	Norfolk, .	7	69.2	1,200 00	-	1,200 00	156	-
321	297	Rowe, .	7	68.9	600 00	30 50	630 50	82	-
255	298	Chesterfield, .	7	67.7	900 00	36 55	936 55	122	42 00
309	299	Hinsdale, .	7	55.7	3,000 00	-	3,000 00	397	25 00
312	300	Carver, .	7	45.7	1,200 00	231 65	1,431 65	192	-
267	301	Hardwick, .	7	33.9	3,800 00	177 71	3,977 71	542	-
251	302	Washington, .	7	31.8	516 10	40 07	556 17	76	-
194	303	Montague, .	7	31.4	9,852 49	-	9,852 49	1,347	-
246	304	Hamilton, .	7	27.3	800 00	-	800 00	110	-
317	305	Norton, .	7	18.9	2,000 00	214 32	2,214 32	308	-
299	306	Williamsburg, .	7	14.4	3,000 00	100 51	3,100 51	434	-
340	307	Mount Washington, .	7	14.3	200 00	-	200 00	28	-
300	308	North Adams, .	7	13.3	19,361 32	361 32	19,722 64	2,765	-

BOARD OF EDUCATION.

Showing the Comparative Amount of Money appropriated by the different Towns in the State — Concluded.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
283	309	Dana,	\$6 97.7	\$700 00	\$60 44	\$760 44	109	-
303	310	Southbridge,	6 97.5	9,500 00	-	9,500 00	1,362	-
292	311	Leverett,	6 86.7	800 00	44 65	844 65	123	\$40 10
290	312	Newbury,	6 86.1	1,840 00	101 60	1,941 60	283	-
329	313	Wales,	6 86.1	1,025 00	38 52	1,063 52	155	-
311	314	Agawam,	6 85.6	3,000 00	160 80	3,160 80	461	-
316	315	Pelham,	6 81.3	600 00	60 87	660 87	97	-
298	316	Middlefield,	6 74.8	800 00	131 29	931 29	138	-
213	317	Rutland,	6 73.7	1,197 90	122 60	1,320 50	196	-
323	318	Egremont,	6 61.5	800 00	40 07	840 07	127	-
268	319	Montgomery,	6 60.4	350 00	-	350 00	53	-
320	320	Leyden,	6 55.7	800 00	-	800 00	122	-
341	321	Alford,	6 55.3	419 36	-	419 36	64	-
327	322	Dudley,	6 53.5	4,000 00	136 90	4,136 90	633	-
325	323	Lanesborough,	6 48.9	1,700 00	-	1,700 00	262	-
259	324	Florida,	6 45.2	800 00	-	800 00	124	-
314	325	Lynnfield,	6 41.4	700 00	69 64	769 64	120	-
295	326	Prescott,	6 30.2	500 00	23 04	523 04	83	-
312	327	New Marlborough,	6 26.6	2,000 00	73 95	2,073 95	331	-
274	328	Tolland,	6 25.7	400 00	37 97	437 97	70	90 00
331	329	Buckland,	6 20.5	2,000 00	91 00	2,091 00	337	-
326	330	Colerain,	6 16.5	2,100 00	57 65	2,157 65	350	-
315	331	Webster,	6 16.1	6,850 00	265 53	7,115 53	1,155	-
336	332	Berlin,	6 14.4	1,000 00	99 70	1,099 70	179	-
322	333	Whately,	6 00	1,200 00	-	1,200 00	200	-
334	334	Anburn,	5 95	1,300 00	140 00	1,440 00	242	-

SCHOOL RETURNS.

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209	335	Heath, .	.	.	5	94.8	600 00	24 50	624 50	105	-
333	336	Shutesbury, .	.	.	5	81	500 00	28 70	528 70	91	-
330	337	Russell, .	.	.	5	55.4	800 00	72 02	872 02	157	-
307	338	Becket, .	.	.	5	39	1,034 89	-	1,034 89	192	-
337	339	Monroe, .	.	.	5	26.3	200 00	-	200 00	38	-
343	340	Richmond, .	.	.	5	26.3	1,300 00	-	1,300 00	247	-
318	341	Goshen, .	.	.	5	17.2	300 00	-	300 00	58	-
296	342	Gill, .	.	.	4	96.9	800 00	-	800 00	161	-
335	343	Savoy, .	.	.	4	95.4	486 00	49 01	535 01	108	-
338	344	Clarksburg, .	.	.	4	60.7	700 00	37 10	737 10	160	-
328	345	Holland, .	.	.	4	12.3	200 00	35 00	235 00	57	-
344	346	New Ashford, .	.	.	3	78	99 00	25 75	124 75	33	-
346	347	Gay Head, .	.	.	3	18.2	70 00	-	70 00	22	-

GRADUATED TABLES — FIRST SERIES.

Showing the Comparative Amount of Money appropriated by the different Counties in the State for the Education of each Child between the Ages of 5 and 15 Years in the County.

	For 1883-'84.	For 1884-'85.	COUNTIES.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
1	1	1	Suffolk,	\$20 04	\$1,384,507 57	\$54,059 61	\$1,438,567 18	71,784	-
2	2	2	Norfolk,	15 29.7	276,779 08	4,036 24	280,815 32	18,357	\$514 00
3	3	3	Middlesex,	14 65	922,253 68	5,252 48	927,506 16	63,311	412 62
6	6	4	Barnstable,	12 51.7	61,850 00	1,171 62	63,021 62	5,035	-
7	7	5	Plymouth,	12 33.6	153,556 02	3,920 41	157,476 43	12,766	-
5	5	6	Essex,	11 98.9	541,250 02	6,739 21	547,989 23	45,708	160 00
4	4	7	Bristol,	11 60	325,778 75	4,364 13	330,142 88	28,460	94 00
8	8	8	Hampden,	10 93.5	232,941 08	2,605 81	235,546 89	21,540	90 00
9	9	9	Worcester,	10 89	488,067 70	4,906 84	492,974 54	45,262	493 69
11	10	10	Dukes,	10 70.1	5,710 00	111 30	5,821 30	544	-
10	11	11	Hampshire,	10 18.4	87,042 64	1,480 12	88,522 76	8,692	42 00
12	12	12	Nantucket,	8 97	4,843 63	-	4,843 63	540	-
13	13	13	Franklin,	8 92.9	61,658 66	1,094 72	62,753 38	7,028	40 10
14	14	14	Berkshire,	8 88.9	129,643 61	1,704 07	131,347 68	14,776	171 00
Aggregate for the State, . . .				-	\$4,675,882 44	\$91,446 56	\$4,767,329 00	343,810	\$2,017 41

GRADUATED TABLES — FIRST SERIES.

Showing the Comparative Amount of Money, including Voluntary Contributions, appropriated by the different Counties in the State, for the Education of each Child between the Ages of 5 and 15 Years in the County.

For 1883-84.	For 1884-85.	COUNTIES.	TOTALS.
1	1	Suffolk,	\$20 04
2	2	Norfolk,	15 32.5
3	3	Middlesex,	14 65.7
6	4	Barnstable,	12 51.7
7	5	Plymouth,	12 33.6
5	6	Essex,	11 99.2
4	7	Bristol,	11 60.4
8	8	Hampden,	10 94
9	9	Worcester,	10 90
11	10	Dukes,	10 70.1
10	11	Hampshire,	10 18.9
12	12	Nantucket,	8 97
13	13	Franklin,	8 93.5
14	14	Berkshire,	8 90.1
STATE,			\$13 87.2

GRADUATED TABLES — (COUNTY TABLES) — FIRST SERIES.

Table showing the Comparative Amount of Money appropriated by the different Towns in each of the Counties in the State for the Education of each Child in the Town, between the Ages of 5 and 15 Years.

BARNSTABLE COUNTY.

	For 1883-84	For 1884-85	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
2		1	FALMOUTH,	\$20 79.4	\$6,600 00	\$199 74	\$6,799 74	327	-
1		2	Barnstable,	18 19.7	11,000 00	282 04	11,282 04	620	-
-		3	Rourne,	16 03.1	3,350 00	225 00	3,575 00	223	-
3		4	Wellfleet,	14 54.5	4,000 00	-	4,000 00	275	-
4		5	Sandwich,	13 66.8	5,100 00	162 23	5,262 23	385	-
6		6	Brewster,	13 09.5	2,200 00	-	2,200 00	168	-
5		7	Orleans,	12 83.9	2,200 00	34 00	2,234 00	174	-
8		8	Yarmouth,	11 11.1	3,500 00	-	3,500 00	315	-
7		9	Mashpee,	10 59.5	500 00	50 94	550 94	52	-
13		10	Harwich,	9 94	5,000 00	-	5,000 00	503	-
9		11	Dennis,	9 92.6	5,000 00	72 10	5,072 10	511	-
11		12	Truro,	9 54.4	1,500 00	46 12	1,546 12	162	-
14		13	Eastham,	9 46.1	800 00	51 45	851 45	90	-
12		14	Provincetown,	9 07	7,800 00	-	7,800 00	860	-
10		15	Chatham,	9 04.9	3,300 00	48 00	3,348 00	370	-

BERKSHIRE COUNTY.

1		1	STOCKBRIDGE,	\$15 48	\$5,000 00	-	\$5,000 00	323	-
8		2	West Stockbridge,	11 95.2	4,314 77	-	4,314 77	361	-

SCHOOL RETURNS.

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19	3	Windsor,	.	.	.	11	51	800	00	\$74	74	874	74	76	-
4	4	Dalton,	.	.	.	11	34.8	4,743	62	-	-	4,743	62	418	-
5	5	Pittsfield,	.	.	.	10	80.1	31,000	00	-	-	31,000	00	2,870	-
9	6	Lee,	.	.	.	10	72.5	8,473	08	-	-	8,473	08	790	\$96 00
3	7	Great Barrington,	.	.	.	10	42.5	8,500	00	257	02	8,757	02	840	-
32	8	Sandisfield,	.	.	.	9	85.2	2,000	00	29	47	2,029	47	206	50 00
10	9	Sheffield,	.	.	.	9	65.2	3,700	00	247	73	3,947	73	409	-
2	10	Peru,	.	.	.	9	51.1	600	00	18	21	618	21	65	-
6	11	Lenox,	.	.	.	9	13.1	4,100	00	-	-	4,100	00	449	-
22	12	Otis,	.	.	.	8	38.2	1,000	00	47	69	1,047	69	125	-
16	13	Cheshire,	.	.	.	8	36.9	2,500	00	77	50	2,577	50	308	-
7	14	Tyringham,	.	.	.	7	97.6	700	00	33	78	733	78	92	-
14	15	Adams,	.	.	.	7	95.4	12,995	47	207	66	13,203	13	1,660	-
13	16	Williamstown,	.	.	.	7	92.7	5,200	00	-	-	5,200	00	656	-
15	17	Monterey,	.	.	.	7	88.4	800	00	83	00	883	00	112	-
17	18	Hancock,	.	.	.	7	84.3	800	00	-	-	800	00	102	-
21	19	Hinsdale,	.	.	.	7	55.7	3,000	00	-	-	3,000	00	397	-
11	20	Washington,	.	.	.	7	31.8	516	10	40	07	556	17	76	25 00
27	21	Mt. Washington,	.	.	.	7	14.3	200	00	-	-	200	00	28	-
18	22	North Adams,	.	.	.	7	13.3	19,361	32	361	32	19,722	64	2,765	-
23	23	Egremont,	.	.	.	6	61.5	800	00	40	07	840	07	127	-
28	24	Alford,	.	.	.	6	55.3	419	36	-	-	419	36	64	-
24	25	Lanesborough,	.	.	.	6	48.9	1,700	00	-	-	1,700	00	262	-
12	26	Florida,	.	.	.	6	45.2	800	00	-	-	800	00	124	-
29	27	New Marlborough,	.	.	.	6	26.6	2,000	00	73	95	2,073	95	331	-
20	28	Becket,	.	.	.	5	39	1,034	89	-	-	1,034	89	192	-
30	29	Richmond,	.	.	.	5	26.3	1,300	00	-	-	1,300	00	247	-
25	30	Savoy,	.	.	.	4	95.4	486	00	49	01	535	01	108	-
26	31	Clarksburg,	.	.	.	4	60.7	700	00	37	10	737	10	160	-
31	32	New Ashford,	.	.	.	3	78	99	00	25	75	124	75	33	-

BRISTOL COUNTY.

	For 1883-'84.	For 1884-'85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the sup- port of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contrib- uted for board and fuel.
1	1	1	NEW BEDFORD,	\$15 31.5	\$77,887 75	\$694 46	\$78,582 21	5,131	-
12	2	2	Fairhaven,	13 01	5,500 00	302 32	5,802 32	446	-
4	3	3	Attleborough,	12 87	27,900 00	812 57	28,712 57	2,231	-
3	4	4	Rehoboth,	12 60	3,200 00	264 98	3,464 98	275	-
2	5	5	Taunton,	12 03.7	46,800 00	46 61	46,846 61	3,892	-
6	6	6	Raynham,	11 93.4	3,000 00	222 08	3,222 08	270	-
8	7	7	Mansfield,	11 90.5	5,500 00	-	5,500 00	462	-
7	8	8	Easton,	11 14.8	8,532 00	386 70	8,918 70	800	-
5	9	9	Swansea,	11 06.2	2,500 00	-	2,500 00	226	\$69 00
11	10	10	Fall River,	10 27.5	120,907 04	-	120,907 04	11,767	-
10	11	11	Dighton,	9 78.8	2,800 00	155 83	2,955 83	302	-
9	12	12	Berkley,	9 61.5	1,500 00	-	1,500 00	156	-
17	13	13	Freetown,	9 57.6	2,000 00	183 26	2,183 26	228	-
13	14	14	Acushnet,	9 51	1,700 00	116 48	1,816 48	191	-
18	15	15	Somerset,	8 69.4	3,851 96	260 48	4,112 44	473	-
14	16	16	Westport,	8 55.1	4,000 00	250 04	4,250 04	497	-
16	17	17	Seekonk,	8 34.9	1,700 00	195 16	1,895 16	227	-
15	18	18	Dartmouth,	8 23.3	4,500 00	258 84	4,758 84	578	25 00
19	19	19	Norton,	7 18.9	2,000 00	214 32	2,214 32	308	-

DUKES COUNTY.

1	1	1	COTTAGE CITY,	\$12 98.8	\$1,250 00	\$22 84	\$1,272 84	98	-
3	2	2	Edgartown,	11 72.5	1,700 00	23 53	1,723 53	147	-

ESSEX COUNTY.

2	3	Gosnold,	11 66.7	240 00	5 00	245 00	21	-
4	4	Tisbury,	10 30	2,000 00	59 93	2,059 93	200	-
5	5	Chilmark,	8 03.6	450 00	-	450 00	56	-
6	6	Gay Head,	3 18.2	70 00	-	70 00	22	-
1	1	NAHANT,	\$27 79.6	\$3,891 39	-	\$3,891 39	140	-
2	2	Swampscott,	17 58.8	6,789 13	-	6,789 13	386	-
3	3	Haverhill,	16 12.7	57,128 17	\$430 00	57,558 17	3,569	-
5	4	Salem,	13 51.4	68,085 82	2,351 00	70,436 82	5,212	-
23	5	Amesbury,	13 49	7,551 37	178 50	7,729 87	573	-
7	6	Lynn,	13 22.4	93,721 06	-	93,721 06	7,087	-
6	7	Merrimac,	13 00.4	5,481 37	149 51	5,630 94	433	-
4	8	North Andover,	12 82.1	9,000 00	-	9,000 00	702	-
11	9	Beverly,	12 46.1	18,345 72	508 03	18,853 75	1,513	-
9	10	Peabody,	12 26.9	22,839 00	631 11	23,470 11	1,913	-
20	11	Gloucester,	12 14.2	48,907 24	-	48,907 24	4,028	-
8	12	Georgetown,	12 12.3	4,500 00	106 91	4,606 91	380	-
12	13	Danvers,	12 07.8	12,470 00	441 00	12,911 00	1,069	-
16	14	Saugus,	12 05.3	6,026 33	-	6,026 33	500	-
10	15	Methuen,	11 73.4	9,000 00	-	9,000 00	767	-
17	16	West Newbury,	11 65.7	3,395 03	113 77	3,508 80	301	-
14	17	Wenham,	11 12.6	1,400 00	90 89	1,490 89	134	-
18	18	Bradford,	11 11.4	5,412 76	-	5,412 76	487	-
19	19	Marblehead,	10 90	14,520 67	420 75	14,941 42	1,371	-
24	20	Essex,	10 77.6	3,000 00	71 10	3,071 10	285	-
13	21	Andover,	10 77.1	9,500 00	-	9,500 00	882	-
26	22	Manchester,	10 75.7	2,700 00	-	2,700 00	251	-
15	23	Lawrence,	10 14.8	72,829 21	-	72,829 21	7,177	-
22	24	Boxford,	9 95.5	1,200 00	163 77	1,363 77	137	\$160 00

BOARD OF EDUCATION.

ESSEX COUNTY — CONCLUDED.

For 1893-94.	For 1894-95.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
21	25	Ipswich,	\$9 62.3	\$6,100 00	\$164 77	\$6,264 77	651	-
29	26	Middleton,	9 51.9	1,200 00	75 52	1,275 52	134	-
25	27	Salisbury,	9 39	7,500 00	274 62	7,774 62	828	-
31	28	Groveland,	8 88.3	3,500 00	-	3,500 00	394	-
27	29	Topsfield,	8 63.2	1,400 00	119 16	1,519 16	176	-
33	30	Rockport,	8 40.5	6,741 00	-	6,741 00	802	-
32	31	Newburyport,	8 26.3	22,000 00	202 62	22,202 62	2,687	-
28	32	Rowley,	8 18.4	1,774 75	74 88	1,849 63	226	-
30	33	Hamilton,	7 27.3	800 00	-	800 00	110	-
34	34	Newbury,	6 86.1	1,840 00	101 60	1,941 60	283	-
35	35	Lynnfield,	6 41.4	700 00	69 64	769 64	120	-

FRANKLIN COUNTY.

For 1893-94.	For 1894-95.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
26	1	BERNARDSTON,	\$14 08	\$2,000 00	\$112 00	\$2,112 00	150	-
1	2	Greenfield,	13 80.8	11,350 00	-	11,350 00	822	-
2	3	Shelburne,	12 65.5	3,000 00	176 32	3,176 32	251	-
3	4	Orange,	10 49.2	6,505 00	-	6,505 00	620	-
10	5	Northfield,	9 87.4	2,200 00	239 00	2,439 00	247	-
8	6	New Salem,	9 72.8	1,200 00	35 50	1,235 50	127	-
6	7	Warwick,	9 58.5	1,151 17	-	1,151 17	120	-
14	8	Ashfield,	9 24.6	1,600 00	64 30	1,664 30	180	-
9	9	Hawley,	9 00.9	1,000 00	-	1,000 00	111	-
11	10	Deerfield,	8 91.4	5,500 00	-	5,500 00	617	-

18	Erving,	8	79.9	1,200 00	58 20	1,258 20	143
5	Wendell,	8	66.4	700 00	27 75	727 75	84
12	Sunderland,	8	48.6	1,200 00	56 00	1,256 00	148
13	Conway,	8	19.7	2,500 00	-	2,500 00	305
16	Charlmont,	7	81.4	1,100 00	48 65	1,148 65	147
20	Rowe,	7	68.9	600 00	30 50	630 50	82
4	Montague,	7	31.4	9,852 49	-	9,852 49	1,347
15	Leverett,	6	86.7	800 00	44 65	844 65	123
19	Leyden,	6	55.7	800 00	-	800 00	122
23	Buckland,	6	20.5	2,000 00	91 00	2,091 00	337
22	Colerain,	6	16.5	2,100 00	57 65	2,157 65	350
21	Whately,	6	00	1,200 00	-	1,200 00	200
7	Heath,	5	94.8	600 00	24 50	624 50	105
24	Shutesbury,	5	81	500 00	28 70	528 70	91
25	Monroe,	5	26.3	200 00	-	200 00	38
17	Gill,	4	96.9	800 00	-	800 00	161
							\$40 10

HAMPDEN COUNTY.

1	SPRINGFIELD,	\$14 28.8	\$94,055 00	-	\$94,055 00	6,583	-
3	Westfield,	13 63.1	20,700 00	\$523 71	21,223 71	1,557	-
2	Longmeadow,	13 00.4	3,000 00	133 98	3,133 98	241	-
6	West Springfield,	11 21.9	9,200 00	280 33	9,480 33	845	-
8	Granville,	10 45	2,000 00	403 82	2,403 82	230	-
18	Ludlow,	10 14.5	3,500 00	-	3,500 00	345	-
9	Palmer,	9 92.4	11,400 00	260 74	11,660 74	1,175	-
4	Chicopee,	9 90.8	21,650 00	-	21,650 00	2,185	-
5	Monson,	9 57	5,500 00	184 59	5,684 59	594	-
14	Brimfield,	9 14.3	1,600 00	-	1,600 00	175	-
7	Hampden,	8 89.1	1,400 00	67 00	1,467 00	165	-
15	Wilbraham,	8 69.8	2,200 00	96 38	2,296 38	264	-

BOARD OF EDUCATION.

HAMPDEN COUNTY -- CONCLUDED.

For 1883-84.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
12	Holyoke, .	\$8 25.4	\$46,361 08	-	\$46,361 08	5,617	-
16	Southwick, .	8 20.8	1,500 00	\$100 47	1,600 47	195	-
10	Blandford, .	8 02.6	1,500 00	73 14	1,573 14	196	-
19	Chester, .	7 89.7	1,600 00	137 34	1,737 34	220	-
21	Wales, .	6 86.1	1,025 00	38 52	1,063 52	155	-
17	Agawam, .	6 85.6	3,000 00	160 80	3,160 80	461	-
11	Montgomery, .	6 60.4	350 00	-	350 00	53	-
13	Tolland, .	6 25.7	400 00	37 97	437 97	70	\$90 00
22	Russell, .	5 55.4	800 00	72 02	872 02	157	-
20	Holland, .	4 12.3	200 00	35 00	235 00	57	-

HAMPSHIRE COUNTY.

For 1883-84.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
2	GRANBY, .	\$13 80.1	\$1,800 00	\$63 19	\$1,863 19	135	-
3	South Hadley, .	13 74.4	8,828 20	173 89	9,002 09	655	-
4	Amherst, .	12 96.6	7,631 44	173 89	7,805 33	602	-
7	Worthington, .	12 47.3	1,233 00	51 73	1,284 73	103	-
6	Northampton, .	11 20.4	26,700 00	-	26,700 00	2,383	-
5	Easthampton, .	10 32.4	8,150 00	150 89	8,300 89	804	-
11	Cummington, .	10 13.5	1,200 00	26 29	1,226 29	121	-
12	Enfield, .	10 11.9	1,700 00	-	1,700 00	168	-
1	Greenwich, .	9 98.3	800 00	38 59	838 59	84	-
9	Huntington, .	9 56.7	1,700 00	79 37	1,779 37	186	-

14	11	Westhampton,	9	10.7	1,000 00	29	05	1,029 05	113	-
8	12	Ware, .	9	09.1	9,200 00	-	-	9,200 00	1,012	-
10	13	Southampton,	8	55.6	1,450 00	64	46	1,514 46	177	-
13	14	Belchertown,	8	31.7	4,000 00	208	24	4,208 24	506	-
23	15	Hatfield, .	7	96.9	2,300 00	50	89	2,350 89	295	-
20	16	Plainfield, .	7	96	500 00	17	38	517 38	65	-
16	17	Hadley, .	7	83.5	2,750 00	-	-	2,750 00	351	-
15	18	Chesterfield,	7	67.7	900 00	36	55	936 55	122	\$42 00
19	19	Williamsburg,	7	14.4	3,000 00	100	51	3,100 51	434	-
21	20	Pelham, .	6	81.3	600 00	60	87	660 87	97	-
18	21	Middlefield,	6	74.8	800 00	131	29	931 29	138	-
17	22	Prescott, .	6	30.2	500 00	23	04	523 04	83	-
22	23	Goshen, .	5	17.2	300 00	-	-	300 00	58	-
MIDDLESEX COUNTY.										
1	1	NEWTON, .	\$24	05.3	\$86,283 12	\$1,581	88	\$87,865 00	3,653	-
4	2	Concord, .	22	69.2	11,800 00	-	-	11,800 00	520	-
3	3	Arlington, .	21	39	20,000 00	-	-	20,000 00	935	-
5	4	Belmont, .	21	19.9	6,359 82	-	-	6,359 82	300	-
2	5	Lexington, .	20	38.8	8,400 00	-	-	8,400 00	412	-
6	6	Winchester, .	19	92.8	13,570 69	-	-	13,570 69	681	\$125 00
7	7	Weston, .	19	14.9	4,500 00	-	-	4,500 00	235	-
16	8	Waltham, .	18	65.1	41,264 18	384	41	41,648 59	2,233	-
8	9	Medford, .	18	22	26,181 46	-	-	26,181 46	1,437	-
11	10	Watertown,	17	04.5	17,505 00	-	-	17,505 00	1,027	-
10	11	Groton, .	16	44.7	5,000 00	-	-	5,000 00	304	-
23	12	Acton, .	16	19.8	4,000 00	260	00	4,260 00	263	-
13	13	Stoneham, .	15	93.1	14,035 00	-	-	14,035 00	881	-
15	14	Cambridge, .	15	76.1	168,357 08	-	-	168,357 08	10,682	214 50
24	15	North Reading, .	15	28.8	1,900 00	133	28	2,033 28	133	-

BOARD OF EDUCATION.

MIDDLESEX COUNTY — CONCLUDED.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
38	16	Littleton, .	\$15 01.5	\$2,400 00	\$212 61	\$2,612 61	174	\$14 12
14	17	Framingham, .	14 78.8	18,000 00	336 75	18,336 75	1,240	-
18	18	Reading, .	14 01.4	8,100 00	-	8,100 00	578	-
29	19	Natick, .	14 00.4	22,000 00	-	22,000 00	1,571	44 00
19	20	Woburn, .	13 82.9	33,480 00	-	33,480 00	2,421	-
26	21	Malden, .	13 76.7	39,180 00	-	39,180 00	2,846	-
12	22	Melrose, .	13 69.3	15,500 00	-	15,500 00	1,132	-
22	23	Everett, .	13 64.8	13,170 00	-	13,170 00	965	-
20	24	Wayland, .	13 49.6	4,500 00	129 21	4,629 21	343	-
28	25	Ashby, .	13 48	1,900 00	95 00	1,995 00	148	-
34	26	Lincoln, .	13 45	2,300 00	-	2,300 00	171	-
21	27	Somerville, .	13 44.9	81,124 00	-	81,124 00	6,032	-
32	28	Carlisle, .	13 26.6	800 00	62 27	862 27	65	-
17	29	Tyngsborough, .	13 21.8	1,150 00	-	1,150 00	87	-
9	30	Boxborough, .	12 92.6	568 76	-	568 76	44	-
30	31	Wakefield, .	12 87.8	16,200 00	-	16,200 00	1,258	-
25	32	Chelmsford, .	12 78.8	4,500 00	270 05	4,770 05	373	-
31	33	Bedford, .	12 73.5	1,600 00	132 11	1,732 11	136	-
27	34	Lowell, .	12 37.2	138,174 27	-	138,174 27	11,168	-
36	35	Tewksbury, .	12 28.1	2,800 00	-	2,800 00	228	-
33	36	Dunstable, .	11 90.5	750 00	-	750 00	63	15 00
37	37	Sherborn, .	11 88.5	2,100 00	63 00	2,163 00	182	-
45	38	Wilmington, .	11 41.2	1,800 00	128 62	2,928 62	169	-
35	39	Sudbury, .	11 28.8	2,000 00	122 22	2,122 22	188	-
39	40	Marlborough, .	10 92	22,900 00	33 00	22,933 00	2,100	-
41	41	Holliston, .	10 90.2	5,800 00	-	5,800 00	532	-

SCHOOL RETURNS.

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53	42	Maynard,	.	.	.	10	63.8	5,000	00	-	5,000	00	470
42	43	Pepperell,	.	.	.	10	37.7	4,400	00	-	4,400	00	424
40	44	Townsend,	.	.	.	10	32.5	3,500	00	-	3,500	00	339
51	45	Shirley,	.	.	.	10	10.6	2,000	00	122	22	210	
48	46	Ayer,	.	.	.	9	92	4,000	00	116	98	415	
44	47	Burlington,	.	.	.	9	78.1	1,100	00	103	01	123	
43	48	Dracut,	.	.	.	9	68.7	3,000	00	196	62	330	
46	49	Hudson,	.	.	.	9	58.5	8,000	00	175	76	853	
50	50	Hopkinton,	.	.	.	9	36.8	7,000	00	372	48	787	
52	51	Stow,	.	.	.	9	23	1,700	00	146	00	200	
47	52	Westford,	.	.	.	9	16.7	3,500	00	75	00	390	
49	53	Ashland,	.	.	.	8	52.4	4,100	00	-	-	481	
54	54	BillERICA,	.	.	.	7	90.8	3,000	00	-	-	379	

NANTUCKET COUNTY.

		NANTUCKET,	.	.	.	\$8	97	\$4,843	63	-	\$4,843	63	540
													-

NORFOLK COUNTY.

3	1	BROOKLINE,	.	.	.	\$29	37.1	\$41,384	00	-	\$41,384	00.	1,409
2	2	Wellesley,	.	.	.	24	65.9	9,334	27	\$307	23	9,641	50
1	3	Milton,	.	.	.	23	65.1	14,474	62	-	-	14,474	62
4	4	Dedham,	.	.	.	21	75.6	22,800	00	-	-	22,800	00
5	5	Norwood,	.	.	.	18	99.3	8,300	00	-	-	8,300	00
7	6	Cohasset,	.	.	.	18	39	6,100	00	207	92	6,307	92
16	7	Holbrook,	.	.	.	16	82.6	6,800	00	216	26	7,016	26

BOARD OF EDUCATION.

NORFOLK COUNTY — CONCLUDED.

	For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and ucl.
11		8	Dover,	\$16 43.6	\$1,400 00	\$79 21	\$1,479 21	90	-
6		9	Needham,	15 81.5	7,900 00	276 48	8,176 48	517	-
9		10	Hyde Park,	14 15.1	24,000 00	-	24,000 00	1,696	-
14		11	Randolph,	13 90.9	9,402 72	-	9,402 72	676	\$350 00
13		12	Foxborough,	13 90.2	5,000 00	310 74	5,310 74	382	-
18		13	Wrentham,	13 57.6	6,000 00	367 27	6,367 27	469	-
10		14	Canton,	13 38	12,122 40	-	12,122 40	906	-
8		15	Weymouth,	13 37.1	26,636 84	654 00	27,290 84	2,041	-
19		16	Braintree,	12 79.4	8,400 00	466 01	8,866 01	693	64 00
20		17	Medway,	12 48.4	6,500 00	416 01	6,916 01	554	100 00
17		18	Medfield,	12 06	2,400 00	-	2,400 00	199	-
12		19	Quincy,	12 00.4	32,818 91	-	32,818 91	2,734	-
22		20	Sharon,	11 65.8	2,400 00	153 00	2,553 00	219	-
23		21	Bellingham,	10 42.8	1,800 00	254 24	2,054 24	197	-
21		22	Stoughton,	9 73.4	9,305 32	-	9,305 32	956	-
15		23	Walpole,	9 28.1	4,000 00	-	4,000 00	431	-
25		24	Franklin,	8 45.4	6,300 00	327 87	6,627 87	784	-
24		25	Norfolk,	7 69.2	1,200 00	-	1,200 00	156	-

PLYMOUTH COUNTY.

7	1	PLYMOUTH,	\$17 97.3	\$21,100 00	-	\$21,100 00	1,174	-
1	2	Hingham,	17 49.8	11,706 02	-	11,706 02	669	-
2	3	Kingston,	16 28.4	3,250 00	\$169 59	3,419 59	210	-

SCHOOL RETURNS.

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4	Bridgewater,	16	04.4	8,500	00	404	64	8,904	64	555	-
8	Abington,	14	64.2	8,800	00	-	-	8,800	00	601	-
3	Hull,	13	33.3	1,000	00	-	-	1,000	00	75	-
5	East Bridgewater,	13	00.4	5,600	00	238	96	2,838	96	449	-
6	Middleborough,	12	39.2	10,000	00	-	-	10,000	00	807	-
10	Rockland,	11	96.5	9,500	00	-	-	9,500	00	794	-
16	Marshfield,	11	71.1	2,500	00	170	15	2,670	15	220	-
13	Brockton,	11	56	32,500	00	607	10	33,107	10	2,864	-
9	Lakeville,	11	01.9	1,800	00	172	35	1,972	35	179	-
12	South Scituate,	10	81.3	2,900	00	160	00	3,060	00	283	-
14	Mattapoisett,	10	79.5	1,900	00	-	-	1,900	00	176	-
18	West Bridgewater,	10	52.6	3,000	00	-	-	3,000	00	285	-
11	Plympton,	10	47.1	900	00	94	70	994	70	95	-
15	Hanover,	10	30.6	3,300	00	131	96	3,431	96	333	-
23	Duxbury,	10	22.7	2,800	00	268	15	3,068	15	300	-
21	Marion,	10	10.2	1,450	00	105	72	1,555	72	154	-
22	Scituate,	9	38	4,500	00	190	00	4,690	00	500	-
19	Wareham,	9	19.3	4,900	00	367	80	5,267	80	573	-
20	South Abington,	8	97	5,000	00	363	95	5,363	95	598	-
17	Halifax,	8	75	700	00	-	-	700	00	80	-
25	Pembroke,	8	75	1,750	00	-	-	1,750	00	200	-
26	Rochester,	8	47.3	1,400	00	116	73	1,516	73	179	-
24	Hanson,	8	10.8	1,600	00	126	96	1,726	96	213	-
27	Carver,	7	45.7	1,200	00	231	65	1,431	65	192	-

SUFFOLK COUNTY.

1	BOSTON,	\$20	61.3	\$1,318,360	00	\$53,633	41	\$1,371,993	41	66,560	-
2	Winthrop,	15	08.1	2,200	00	152	60	2,352	60	156	-
4	Chelsea,	12	67.3	56,572	57	-	-	56,572	57	4,464	-
3	Revere,	12	66.3	7,375	00	273	60	7,648	60	604	-

WORCESTER COUNTY.

For 1883-84.	For 1884-85.	TOWNS.	Sum appropriated by towns for each child between 5 and 15 yrs. of age.	Amount raised by taxes for the support of Schools.	Income of Funds, with Dog Tax, appropriated to Schools.	TOTAL.	No. of Children between 5 and 15 years of age.	Amount contributed for board and fuel.
1	1	LANCASTER,	\$15 52.2	\$4,951 64	-	\$4,951 64	319	-
2	2	Sterling,	15 17.9	3,400 00	-	3,400 00	224	-
3	3	Southborough,	15 04.6	4,200 00	\$118 30	4,318 30	287	-
5	4	New Braintree,	14 87.5	1,467 02	65 09	1,532 11	103	-
14	5	Upton,	14 74.4	4,600 00	-	4,600 00	312	\$358 49
4	6	Harvard,	14 61	2,250 00	-	2,250 00	154	-
30	7	Oxford,	13 63.3	4,500 00	353 35	4,853 35	356	-
12	8	Barre,	13 51.1	4,800 00	172 03	4,972 03	368	-
8	9	Northborough,	13 41	3,500 00	-	3,500 00	261	-
11	10	Worcester,	13 12.4	169,086 66	-	169,086 66	12,884	-
13	11	Leominster,	12 99.6	12,372 32	-	12,372 32	952	-
7	12	Shrewsbury,	12 96.3	3,500 00	-	3,500 00	270	63 20
9	13	Lunenburg,	12 88.6	1,700 00	104 00	1,804 00	140	-
27	14	Princeton,	12 55.1	1,700 00	32 00	1,732 00	138	-
10	15	Fitchburg,	12 53.9	34,966 68	154 00	35,020 68	2,793	-
23	16	Westborough,	12 15.1	10,000 00	-	10,000 00	823	-
24	17	Boylston,	12 01.3	1,850 00	-	1,850 00	154	-
19	18	Northbridge,	11 65.9	8,800 00	212 52	9,012 52	773	-
6	19	Petersham,	11 60.3	1,600 00	186 85	1,786 85	154	-
25	20	Uxbridge,	11 56	6,300 00	-	6,300 00	545	-
17	21	Royalston,	10 91.6	2,000 00	128 62	2,128 62	195	-
21	22	Paxton,	10 87	1,000 00	-	1,000 00	92	-
18	23	Milford,	10 85.4	18,560 97	-	18,560 97	1,710	-
45	24	Charlton,	10 67.6	3,000 00	-	3,000 00	281	72 00
26	25	Leicester,	10 47.3	6,000 00	304 80	6,304 80	602	-
22	26	Westminster,	10 45.3	3,000 00	-	3,000 00	287	-

SCHOOL RETURNS.

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28	27	Ashburnham,	10 43	3,000 00	149 80	3,149 80	302	-
15	28	Warren,	10 28.7	7,705 11	-	7,705 11	749	-
16	29	Bolton,	10 27.4	1,500 00	-	1,500 00	146	-
31	30	Millbury,	10 02.2	9,000 00	-	9,000 00	898	-
29	31	Clinton,	9 94	17,573 42	-	17,573 42	1,768	-
35	32	Athol,	9 82.3	8,000 00	221 62	8,221 62	837	-
34	33	North Brookfield,	9 65.5	7,500 00	301 18	7,801 18	808	-
33	34	Phillipston,	9 52.3	800 00	47 53	847 53	89	-
20	35	Grafton,	9 43	8,223 30	-	8,223 30	872	-
38	36	Brookfield,	9 31.6	5,200 00	165 83	5,365 83	576	-
36	37	Holden,	9 18.7	4,014 55	229 89	4,244 44	462	-
37	38	Templeton,	9 10.1	4,700 00	141 85	4,841 85	532	-
40	39	Sturbridge,	8 99.5	3,400 00	-	3,400 00	378	-
46	40	Douglas,	8 94.5	3,900 00	-	3,900 00	436	-
47	41	Hubbardston,	8 92.9	2,000 00	-	2,000 00	224	-
44	42	Sutton,	8 78.6	4,500 00	156 53	4,656 53	530	-
49	43	Mendon,	8 58.9	1,500 00	97 64	1,597 64	186	-
39	44	West Brookfield,	8 49.9	3,000 00	-	3,000 00	353	-
41	45	Winchendon,	8 48.6	5,813 13	-	5,813 13	685	-
54	46	Spencer,	8 41	14,835 00	-	14,835 00	1,764	-
53	47	Oakham,	8 25.6	950 00	115 00	1,065 00	129	-
50	48	Gardner,	8 24.1	11,000 00	356 45	11,356 45	1,378	-
42	49	Blackstone,	8 23.9	8,000 00	189 08	8,189 08	994	-
51	50	West Boylston,	7 78.6	4,500 00	-	4,500 00	578	-
43	51	Hardwick,	7 33.9	3,800 00	177 71	3,977 71	542	-
48	52	Dana,	6 97.7	700 00	60 44	760 44	109	-
52	53	Southbridge,	6 97.5	9,500 00	-	9,500 00	1,362	-
32	54	Rutland,	6 73.7	1,197 90	122 60	1,320 50	196	-
56	55	Dudley,	6 53.5	4,000 00	136 90	4,136 90	633	-
55	56	Webster,	6 16.1	6,850 00	265 53	7,115 53	1,155	-
58	57	Berlin,	6 14.4	1,000 00	99 70	1,099 70	179	-
57	58	Auburn,	5 95	1,300 00	140 00	1,440 00	242	-

GRADUATED TABLES — SECOND SERIES.

The next Table exhibits the appropriation of the cities and towns, as compared with their respective valuation in 1884.

The first column shows the rank of the cities and towns in a similar Table for 1883-84, according to their valuation in 1884.

The second column indicates, in numerical order, the precedence of the cities and towns in respect to the liberality of their appropriations for 1884-85, according to their valuation in 1884.

The third consists of the names of the cities and towns, as numerically arranged.

The fourth shows the percentage of taxable property appropriated to the support of the public schools. The result is equivalent in value to mills and hundredths of mills. The decimals are carried to three figures, in order to indicate more perfectly the distinction between the different towns. The first figure (mills) expresses the principal value, and is separated from the last two figures by a dash.

The appropriations for schools are not given in the following Table, as they may be found by referring to the previous Tables; also in the Abstract of School Returns, commencing on page ii. These appropriations include the sum raised by taxes, the income of the surplus revenue, and of such other funds as the towns may appropriate at their option, either to support common schools, or to pay ordinary municipal expenses. The income of other local funds, and the voluntary contributions, are not included in the estimate. The appropriations are reckoned the same as in the first series of Tables, and for the same reasons.

The amount of taxable property, in each city and town, according to the last State valuation, is also omitted, as it is already given in the foregoing Abstract of School Returns.

If the rank assigned to towns in the next Tables is compared with the rank of the same town in the former series, it will be seen that they hold, in many instances, a very different place in the scale.

GRADUATED TABLES — SECOND SERIES.

[FOR THE STATE.]

A Graduated Table in which all the Towns in the State are numerically arranged according to the Percentage of their Taxable Property appropriated to the Support of Public Schools for the Year 1884-85.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.
4	1	GRANVILLE, .	\$.006-88	39	34	Stoneham, .	\$.004-58
5	2	Holbrook, .	6-85	38	35	Wakefield, .	4-57
2	3	Hawley, .	6-55	30	36	Blandford, .	4-54
17	4	W. Stockbr'ge, .	5-90	70	37	Palmer, .	4-54
1	5	Truro, .	5-88	36	38	Belchertown, .	4-53
9	6	South Hadley, .	5-82	37	39	Dedham, .	4-52
11	7	Sandwich, .	5-57	31	40	Wellfleet, .	4-51
19	8	Brewster, .	5-56	23	41	Needham, .	4-48
315	9	Bernardston, .	5-50	62	42	Lee, .	4-46
7	10	Marlborough, .	5-47	197	43	Ludlow, .	4-44
8	11	Chatham, .	5-43	63	44	Templeton, .	4-41
12	12	Upton, .	5-31	28	45	Granby, .	4-38
21	13	Amesbury, .	5-13	46	46	Saugus, .	4-37
337	14	Sandisfield, .	5-13	56	47	Dudley, .	4-36
14	15	Peru, .	5-12	40	48	Mashpee, .	4-35
15	16	Orleans, .	5-11	49	49	Northbridge, .	4-34
27	17	Attleborough, .	5-07	35	50	Wareham, .	4-33
6	18	Florida, .	5-07	72	51	Brookfield, .	4-32
10	19	Harwich, .	5-04	66	52	Sheffield, .	4-32
25	20	Merrimac, .	4-95	45	53	Adams, .	4-31
42	21	Mansfield, .	4-91	59	54	Bridgewater, .	4-31
16	22	Weymouth, .	4-91	87	55	Gloucester, .	4-30
18	23	Otis, .	4-89	92	56	Lakeville, .	4-30
75	24	Wrentham, .	4-83	71	57	Norwood, .	4-28
13	25	Monroe, .	4-77	33	58	Warwick, .	4-28
22	26	Hyde Park, .	4-74	53	59	Georgetown, .	4-27
43	27	Natick, .	4-71	55	60	Ashby, .	4-24
32	28	Rehoboth, .	4-71	20	61	Stoughton, .	4-23
44	29	Abington, .	4-69	52	62	Woburn, .	4-23
48	30	Randolph, .	4-69	102	63	Spencer, .	4-22
88	31	Deerfield, .	4-66	67	64	N Brookfield, .	4-21
29	32	Dennis, .	4-66	51	65	Rockland, .	4-19
180	33	Plymouth, .	4-60	34	66	Bradford, .	4-18

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.
24	67	No. Andover,	\$.004-17	105	117	Douglas,	\$.003-70
112	68	Buckland,	4-15	82	118	Foxborough,	3-70
125	69	Fairhaven,	4-14	129	119	Leicester,	3-68
84	70	Holden,	4-14	108	120	W. Brookfield,	3-68
65	71	Groveland,	4-13	86	121	Grafton,	3-67
64	72	Arlington,	4-11	178	122	Greenfield,	3-67
60	73	Dighton,	4-11	114	123	Middleboro',	3-67
58	74	W. Boylston,	4-11	116	124	Berkley,	3-65
145	75	Leyden,	4-10	120	125	Pittsfield,	3-65
50	76	Quincy,	4-05	186	126	Ayer,	3-64
160	77	Windsor,	4-04	100	127	Canton,	3-63
57	78	Haverhill,	4-03	295	128	Gay Head,	3-63
76	79	Hudson,	4-03	199	129	Oxford,	3-63
54	80	Monson,	4-03	41	130	Wendell,	3-63
106	81	New Salem,	4-02	78	131	Bellingham,	3-62
81	82	Westhampton,	4-02	104	132	Danvers,	3-62
93	83	No. Reading,	4-01	154	133	Winchester,	3-62
97	84	Waltham,	4-01	240	134	Plainfield,	3-61
83	85	North Adams,	3-98	135	135	Blackstone,	3-60
91	86	Westminster,	3-97	118	136	Erving,	3-60
90	87	Wayland,	3-96	205	137	Gardner,	3-60
74	88	Provincetown,	3-95	26	138	Medway,	3-58
111	89	Barnstable,	3-93	124	139	Shrewsbury,	3-58
61	90	Chicopee,	3-93	73	140	Rowley,	3-57
110	91	Northfield,	3-93	184	141	Sutton,	3-57
85	92	E. Bridgew'r,	3-92	139	142	Tyngsboro',	3-57
69	93	Millbury,	3-92	121	143	Paxton,	3-56
96	94	Clarksburg,	3-91	172	144	Plympton,	3-56
134	95	Worthington,	3-90	144	145	Hingham,	3-55
113	96	Westborough,	3-89	115	146	Milford,	3-54
89	97	Orange,	3-87	168	147	Shutesbury,	3-53
94	98	Pelham,	3-87	174	148	Peabody,	3-52
95	99	Sterling,	3-84	158	149	Townsend,	3-50
182	100	Hinsdale,	3-83	147	150	Westford,	3-50
79	101	Concord,	3-81	123	151	Rowe,	3-49
101	102	Monterey,	3-81	212	152	Sturbridge,	3-49
211	103	Somerset,	3-81	126	153	Swansea,	3-49
98	104	Ashfield,	3-79	165	154	Longmeadow,	3-48
68	105	Eastham,	3-79	140	155	Hardwick,	3-47
222	106	Shelburne,	3-78	77	156	Melrose,	3-47
3	107	Heath,	3-77	189	157	N'w Braintree,	3-45
109	108	Raynham,	3-77	133	158	Williamsburg,	3-45
152	109	Colerain,	3-75	163	159	Chester,	3-44
117	110	Cummington,	3-75	141	160	Clinton,	3-43
-	111	Bourne,	3-73	119	161	Marblehead,	3-43
130	112	Boylston,	3-73	99	162	Montague,	3-43
138	113	Huntington,	3-73	191	163	Westfield,	3-43
148	114	Cheshire,	3-72	192	164	W. Newbury,	3-43
171	115	Essex,	3-72	142	165	Franklin,	3-42
103	116	Charlemont,	3-71	166	166	Reading,	3-42

SCHOOL RETURNS.

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For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.
238	167	Wales, . . .	\$.003-42	202	217	Chelsea, . . .	\$.003-12
127	168	Warren, . . .	3-42	256	218	Bolton, . . .	3-11
161	169	South Scituate, . . .	3-41	226	219	Charlton, . . .	3-11
151	170	Conway, . . .	3-40	248	220	Northampton, . . .	3-11
173	171	Lynn, . . .	3-40	149	221	Petersham, . . .	3-11
157	172	Methuen, . . .	3-40	131	222	Tyringham, . . .	3-11
231	173	Wilmington, . . .	3-39	203	223	Williamstown, . . .	3-11
241	174	Littleton, . . .	3-38	225	224	Braintree, . . .	3-10
175	175	Acton, . . .	3-37	218	225	Southbridge, . . .	3-07
263	176	Rockport, . . .	3-37	217	226	Southampton, . . .	3-06
146	177	Salisbury, . . .	3-37	232	227	Middlefield, . . .	3-04
185	178	Ashburnham, . . .	3-35	251	228	Oakham, . . .	3-04
169	179	Barre, . . .	3-35	259	229	Lanesboro', . . .	3-03
179	180	Holliston, . . .	3-35	207	230	Tisbury, . . .	3-03
156	181	Scituate, . . .	3-35	249	231	Dalton, . . .	3-02
233	182	Hopkinton, . . .	3-34	80	232	Norfolk, . . .	3-02
153	183	Hampden, . . .	3-33	228	233	Winchendon, . . .	3-01
190	184	Somerville, . . .	3-33	239	234	Holyoke, . . .	2-99
128	185	Webster, . . .	3-33	253	235	Shirley, . . .	2-97
187	186	Worcester, . . .	3-33	219	236	Sunderland, . . .	2-97
235	187	Rochester, . . .	3-32	234	237	Auburn, . . .	2-95
177	188	Brimfield, . . .	3-30	236	238	Wenham, . . .	2-95
215	189	Malden, . . .	3-30	208	239	Becket, . . .	2-94
198	190	N. Marlboro', . . .	3-30	230	240	Newburyport, . . .	2-94
229	191	Athol, . . .	3-28	275	241	Norton, . . .	2-93
188	192	Hanson, . . .	3-28	224	242	Ashland, . . .	2-92
137	193	Easthampton, . . .	3-27	262	243	Pepperell, . . .	2-91
245	194	Wilbraham, . . .	3-27	322	244	Enfield, . . .	2-90
181	195	Lexington, . . .	3-25	167	245	Prescott, . . .	2-89
164	196	Southborough, . . .	3-25	293	246	Whately, . . .	2-89
107	197	Ware, . . .	3-25	267	247	Southwick, . . .	2-88
227	198	Leominster, . . .	3-24	209	248	Acushnet, . . .	2-87
136	199	Chesterfield, . . .	3-23	254	249	Dana, . . .	2-87
206	200	Phillipston, . . .	3-21	47	250	Greenwich, . . .	2-87
196	201	Framingham, . . .	3-20	243	251	Taunton, . . .	2-86
155	202	Medford, . . .	3-20	257	252	Brockton, . . .	2-84
183	203	Northboro', . . .	3-20	204	253	Lenox, . . .	2-83
170	204	Chelmsford, . . .	3-19	247	254	Duxbury, . . .	2-82
176	205	Ipswich, . . .	3-19	246	255	Amherst, . . .	2-81
200	206	Uxbridge, . . .	3-19	195	256	Savoy, . . .	2-81
216	207	Royalston, . . .	3-18	290	257	Halifax, . . .	2-80
159	208	W. Bridgew'r, . . .	3-18	292	258	Mendon, . . .	2-79
193	209	Fitchburg, . . .	3-17	273	259	Pembroke, . . .	2-79
223	210	Newton, . . .	3-16	252	260	Salem, . . .	2-78
213	211	W. Springfi'd, . . .	3-16	276	261	Fall River, . . .	2-73
201	212	Hanover, . . .	3-15	250	262	Maynard, . . .	2-73
162	213	Westport, . . .	3-15	271	263	Hubbardston, . . .	2-72
220	214	Cambridge, . . .	3-14	244	264	Lowell, . . .	2-70
194	215	Gt. Barringt'n, . . .	3-14	274	265	Sherborn, . . .	2-68
214	216	Leverett, . . .	3-14	268	266	Springfield, . . .	2-68

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.
122	267	Washington, .	\$.002-68	300	308	Medfield, .	\$.002-19
258	268	Dracut, . .	2-67	305	309	Kingston, .	2-18
261	269	Everett, . .	2-66	237	310	Goshen, . .	2-17
242	270	Lawrence, .	2-66	304	311	Carlisle, .	2-15
278	271	Lunenburg, .	2-66	317	312	Stockbridge, .	2-14
308	272	Richmond, .	2-66	306	313	Boxford, .	2-12
265	273	Seekonk, . .	2-66	311	314	Hancock, .	2-10
221	274	Tolland, . .	2-65	310	315	Topsfield, .	2-10
266	275	Easton, . .	2-63	312	316	Chilmark, .	2-08
270	276	Freetown, .	2-63	330	317	Lincoln, .	2-08
143	277	Rutland, . .	2-63	318	318	Cohasset, .	2-07
285	278	Carver, . .	2-61	321	319	Princeton, .	2-05
307	279	Marshfield, .	2-61	309	320	Sudbury, .	2-05
282	280	Agawam, . .	2-59	313	321	Boston, . .	2-01
132	281	Walpole, . .	2-59	319	322	Egremont, .	2-00
255	282	Andover, . .	2-57	299	323	Holland, . .	1-99
284	283	Revere, . .	2-56	331	324	Dover, . .	1-98
210	284	Montgomery, .	2-54	329	325	Marion, . .	1-98
333	285	Hatfield, . .	2-53	324	326	Falmouth, .	1-97
301	286	Mt. Wash'ton, .	2-53	320	327	Swampscott, .	1-94
281	287	Dartmouth, .	2-51	326	328	Beverly, . .	1-92
277	288	Dunstable, . .	2-51	323	329	Russell, . .	1-91
264	289	New Bedford, .	2-51	327	330	Billerica, .	1-89
269	290	Harvard, . .	2-49	325	331	Gill, . . .	1-89
283	291	Tewksbury, .	2-49	314	332	Stow, . . .	1-88
280	292	Burlington, .	2-48	316	333	Groton, . .	1-86
291	293	Watertown, .	2-48	328	334	Nantucket, .	1-81
288	294	Hadley, . . .	2-43	332	335	Alford, . .	1-79
286	295	Middleton, .	2-41	338	336	Brookline, .	1-55
287	296	Yarmouth, . .	2-41	341	337	New Ashford, .	1-47
297	297	Weston, . . .	2-40	336	338	Lynnfield, .	1-40
260	298	Wellesley, .	2-36	334	339	Hamilton, .	1-29
294	299	Bedford, . .	2-33	342	340	Gosnold, . .	1-26
289	300	So. Abington, .	2-32	339	341	Milton, . .	1-23
303	301	Sharon, . . .	2-31	335	342	Mattapoisett, .	1-22
279	302	Lancaster, . .	2-28	340	343	Winthrop, . .	1-21
298	303	Berlin, . . .	2-27	343	344	Cottage City, .	0-94
272	304	Newbury, . .	2-27	344	345	Nahant, . .	0-84
150	305	Boxborough, .	2-24	345	346	Manchester, .	0-59
296	306	Edgartown, .	2-24	346	347	Hull, . . .	0-46
302	307	Belmont, . .	2-22				

GRADUATED TABLES — SECOND SERIES.

[COUNTY TABLES.]

In which all the Towns in the respective Counties in the State are numerically arranged according to the Percentage of their Taxable Property appropriated for the Support of Public Schools for the year 1884-85.

BARNSTABLE COUNTY.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Val- uation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Val- uation appropriated to Public Schools— equivalent to mills and hundredths of mills.
1	1	TRURO, .	\$.005-88	9	9	Mashpee, .	\$.004-35
4	2	Sandwich, .	5-57	11	10	Provincetown, .	3-95
6	3	Brewster, .	5-56	12	11	Barnstable, .	3-93
2	4	Chatham, .	5-43	10	12	Eastham, .	3-79
5	5	Orleans, .	5-11	-	13	Bourne, .	3-73
3	6	Harwich, .	5-04	13	14	Yarmouth, .	2-41
7	7	Dennis, .	4-66	14	15	Falmouth, .	1-97
8	8	Wellfleet, .	4-51				

BERKSHIRE COUNTY.

3	1	WEST STOCKBRIDGE, .	\$.005-90	17	17	Gt. Barrington, .	\$.003-14
31	2	Sandisfield, .	5-13	13	18	Tyringham, .	3-11
2	3	Peru, .	5-12	20	19	Williamstown, .	3-11
1	4	Florida, .	5-07	24	20	Lanesboro', .	3-03
4	5	Otis, .	4-89	23	21	Dalton, .	3-02
6	6	Lee, .	4-46	22	22	Becket, .	2-94
7	7	Sheffield, .	4-32	21	23	Lenox, .	2-83
5	8	Adams, .	4-31	18	24	Savoy, .	2-81
15	9	Windsor, .	4-04	12	25	Washington, .	2-68
8	10	North Adams, .	3-98	26	26	Richmond, .	2-66
9	11	Clarksburg, .	3-91	25	27	Mt. W'hingt'n, .	2-53
16	12	Hinsdale, .	3-83	28	28	Stockbridge, .	2-14
10	13	Monterey, .	3-81	27	29	Hancock, .	2-10
14	14	Cheshire, .	3-72	29	30	Egremont, .	2-00
11	15	Pittsfield, .	3-65	30	31	Alford, .	1-79
19	16	N. Marlboro', .	3-30	32	32	New Ashford, .	1-47

BOARD OF EDUCATION.

BRISTOL COUNTY.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.
1	1	ATTLEBOROUGH, .	\$.005-07	17	11	Norton, .	\$.002-93
3	2	Mansfield, .	4-91	10	12	Acushnet, .	2-87
2	3	Rehoboth, .	4-71	12	13	Taunton, .	2-86
7	4	Fairhaven, .	4-14	18	14	Fall River, .	2-73
4	5	Dighton, .	4-11	14	15	Seekonk, .	2-66
11	6	Somerset, .	3-81	15	16	Easton, .	2-63
5	7	Raynham, .	3-77	16	17	Freetown, .	2-63
6	8	Berkley, .	3-65	19	18	Dartmouth, .	2-51
8	9	Swansea, .	3-49	13	19	New Bedford, .	2-51
9	10	Westport, .	3-15				

DUKES COUNTY.

2	1	GAY HEAD, .	\$.003-63	4	4	Chilmark, .	\$.002-08
1	2	Tisbury, .	3-03	5	5	Gosnold, .	1-26
3	3	Edgartown, .	2-24	6	6	Cottage City, .	0-94

ESSEX COUNTY.

1	1	AMESBURY, .	\$.005-13	13	19	Salisbury, .	\$.003-37
3	2	Merrimac, .	4-95	18	20	Ipswich, .	3-19
5	3	Saugus, .	4-37	21	21	Wenham, .	2-95
10	4	Gloucester, .	4-30	20	22	Newburyport, .	2-94
6	5	Georgetown, .	4-27	23	23	Salem, .	2-78
4	6	Bradford, .	4-18	22	24	Lawrence, .	2-66
2	7	No. Andover, .	4-17	24	25	Andover, .	2-57
8	8	Groveland, .	4-13	27	26	Middleton, .	2-41
7	9	Haverhill, .	4-03	26	27	Newbury, .	2-27
15	10	Essex, .	3-72	28	28	Boxford, .	2-12
11	11	Danvers, .	3-62	29	29	Topsfield, .	2-10
9	12	Rowley, .	3-57	30	30	Swampscott, .	1-94
17	13	Peabody, .	3-52	31	31	Beverly, .	1-92
12	14	Marblehead, .	3-43	33	32	Lynnfield, .	1-40
19	15	W. Newbury, .	3-43	32	33	Hamilton, .	1-29
16	16	Lynn, .	3-40	34	34	Nahant, .	0-84
14	17	Methuen, .	3-40	35	35	Manchester, .	0-59
25	18	Rockport, .	3-37				

SCHOOL RETURNS.

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FRANKLIN COUNTY.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valu- ation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valu- ation appropriated to Public Schools— equivalent to mills and hundredths of mills.
1	1	HAWLEY, .	\$.006-55	18	14	Colerain, .	\$.003-75
25	2	Bernardston, .	5-50	10	15	Charlemont, .	3-71
3	3	Monroe, .	4-77	20	16	Greenfield, .	3-67
6	4	Deerfield, .	4-66	5	17	Wendell, .	3-63
4	5	Warwick, .	4-28	14	18	Erving, .	3-60
13	6	Buckland, .	4-15	19	19	Shutesbury, .	3-53
16	7	Leyden, .	4-10	15	20	Rowe, .	3-49
11	8	New Salem, .	4-02	9	21	Montague, .	3-43
12	9	Northfield, .	3-93	17	22	Conway, .	3-40
7	10	Orange, .	3-87	21	23	Leverett, .	3-14
8	11	Ashfield, .	3-79	22	24	Sunderland, .	2-97
23	12	Shelburne, .	3-78	24	25	Whately, .	2-89
2	13	Heath, .	3-77	26	26	Gill, .	1-89

HAMPDEN COUNTY.

1	1	GRANVILLE, .	\$.006-88	9	12	Brimfield, .	\$.003-30
2	2	Blandford, .	4-54	17	13	Wilbraham, .	3-27
5	3	Palmer, .	4-54	13	14	W. Springfield, .	3-16
11	4	Ludlow, .	4-44	16	15	Holyoke, .	2-99
3	5	Monson, .	4-03	18	16	Southwick, .	2-88
4	6	Chicopee, .	3-93	19	17	Springfield, .	2-68
8	7	Longmeadow, .	3-48	14	18	Tolland, .	2-65
7	8	Chester, .	3-44	20	19	Agawam, .	2-59
10	9	Westfield, .	3-43	12	20	Montgomery, .	2-54
15	10	Wales, .	3-42	21	21	Holland, .	1-99
6	11	Hampden, .	3-33	22	22	Russell, .	1-91

HAMPSHIRE COUNTY.

1	1	SOUTH HADLEY, .	\$.005-82	11	13	Chesterfield, .	\$.003-23
3	2	Belchertown, .	4-53	20	14	Northampton, .	3-11
2	3	Granby, .	4-38	15	15	Southampton, .	3-06
5	4	Westhampton, .	4-02	16	16	Middlefield, .	3-04
10	5	Worthington, .	3-90	22	17	Enfield, .	2-90
6	6	Pelham, .	3-87	14	18	Prescott, .	2-89
8	7	Cummington, .	3-75	4	19	Greenwich, .	2-87
13	8	Huntington, .	3-73	19	20	Amherst, .	2-81
18	9	Plainfield, .	3-61	23	21	Hatfield, .	2-53
9	10	Williamsburg, .	3-45	21	22	Hadley, .	2-43
12	11	Easthampton, .	3-27	17	23	Goshen, .	2-17
7	12	Ware, .	3-25				

BOARD OF EDUCATION.

MIDDLESEX COUNTY.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.
1	1	MARLBOROUGH, .	\$.005-47	27	28	Framingham, .	\$.003-20
4	2	Natick, .	4-73	18	29	Medford, .	3-20
3	3	Stoneham, .	4-58	21	30	Chelmsford, .	3-19
2	4	Wakefield, .	4-57	30	31	Newton, .	3-16
6	5	Ashby, .	4-24	29	32	Cambridge, .	3-14
5	6	Woburn, .	4-23	37	33	Shirley, .	2-97
7	7	Arlington, .	4-11	31	34	Ashland, .	2-92
8	8	Hudson, .	4-03	40	35	Pepperell, .	2-91
12	9	No. Reading, .	4-01	36	36	Maynard, .	2-73
13	10	Waltham, .	4-01	35	37	Lowell, .	2-70
11	11	Wayland, .	3-96	41	38	Sherborn, .	2-68
10	12	Concord, .	3-81	38	39	Dracut, .	2-67
25	13	Ayer, .	3-64	39	40	Everett, .	2-66
17	14	Winchester, .	3-62	42	41	Dunstable, .	2-51
14	15	Tyngsborough, .	3-57	44	42	Tewksbury, .	2-49
19	16	Townsend, .	3-50	43	43	Burlington, .	2-48
15	17	Westford, .	3-50	45	44	Watertown, .	2-48
9	18	Melrose, .	3-47	47	45	Weston, .	2-40
20	19	Reading, .	3-42	46	46	Bedford, .	2-33
32	20	Wilmington, .	3-39	16	47	Boxborough, .	2-24
34	21	Littleton, .	3-38	48	48	Belmont, .	2-22
22	22	Acton, .	3-37	49	49	Carlisle, .	2-15
23	23	Holliston, .	3-35	54	50	Lincoln, .	2-08
33	24	Hopkinton, .	3-34	50	51	Sudbury, .	2-05
26	25	Somerville, .	3-33	53	52	Billerica, .	1-89
28	26	Malden, .	3-30	51	53	Stow, .	1-88
24	27	Lexington, .	3-25	52	54	Groton, .	1-86

NANTUCKET COUNTY.

		NANTUCKET,	\$.001-81
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NORFOLK COUNTY.

1	1	HOLBROOK, .	\$.006-85	9	10	Quincy, .	\$.004-05
2	2	Weymouth, .	4-91	14	11	Foxborough, .	3-70
11	3	Wrentham, .	4-83	15	12	Canton, .	3-63
4	4	Hyde Park, .	4-74	12	13	Bellingham, .	3-62
8	5	Randolph, .	4-69	6	14	Medway, .	3-58
7	6	Dedham, .	4-52	17	15	Franklin, .	3-42
5	7	Needham, .	4-48	18	16	Braintree, .	3-10
10	8	Norwood, .	4-28	13	17	Norfolk, .	3-02
3	9	Stoughton, .	4-23	16	18	Walpole, .	2-59

SCHOOL RETURNS.

cxix

NORFOLK COUNTY — CONCLUDED.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.
19	19	Wellesley, .	\$.002-36	23	23	Dover, .	\$.001-98
21	20	Sharon, .	2-31	24	24	Brookline, .	1-55
20	21	Medfield, .	2-19	25	25	Milton, .	1-23
22	22	Cohasset, .	2-07				

PLYMOUTH COUNTY.

2	1	ABINGTON, .	\$.004-69	10	15	W. Bridgew'r,	\$.003-18
13	2	Plymouth, .	4-60	15	16	Hanover, .	3-15
1	3	Wareham, .	4-33	18	17	Brockton, .	2-84
4	4	Bridgewater, .	4-31	17	18	Duxbury, .	2-82
6	5	Lakeville, .	4-30	22	19	Halifax, .	2-80
3	6	Rockland, .	4-19	19	20	Pembroke, .	2-79
5	7	E. Bridgew'r,	3-92	20	21	Carver, .	2-61
7	8	Middleboro', .	3-67	24	22	Marshfield, .	2-61
12	9	Plympton, .	3-56	21	23	So. Abington,	2-32
8	10	Hingham, .	3-55	23	24	Kingston, .	2-18
11	11	So. Scituate, .	3-41	25	25	Marion, .	1-98
9	12	Scituate, .	3-35	26	26	Mattapoisett, .	1-22
16	13	Rochester, .	3-32	27	27	Hull, .	0-46
14	14	Hanson, .	3-28				

SUFFOLK COUNTY.

1	1	CHELSEA, .	\$.003-12	3	3	Boston, .	\$.002-01
2	2	Revere, .	2-56	4	4	Winthrop, .	1-21

WORCESTER COUNTY.

1	1	UPTON, .	\$.005-31	7	11	Millbury, .	\$.003-92
5	2	Templeton, .	4-41	16	12	Westborough,	3-89
3	3	Dudley, .	4-36	12	13	Sterling, .	3-84
2	4	Northbridge, .	4-34	23	14	Boylston, .	3-73
8	5	Brookfield, .	4-32	14	15	Douglas, .	3-70
13	6	Spencer, .	4-22	22	16	Leicester, .	3-68
6	7	N. Brookfield,	4-21	15	17	W. Brookfield,	3-68
9	8	Holden, .	4-14	10	18	Grafton, .	3-67
4	9	W. Boylston, .	4-11	37	19	Oxford, .	3-63
11	10	Westminster, .	3-97	24	20	Blackstone, .	3-60

BOARD OF EDUCATION.

WORCESTER COUNTY — CONCLUDED.

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.	For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	TOWNS.	Percentage of Valuation appropriated to Public Schools— equivalent to mills and hundredths of mills.
39	21	Gardner, .	\$.003-60	38	40	Uxbridge, .	\$.003-19
19	22	Amesbury, .	3-58	42	41	Royalston, .	3-18
32	23	Sutton, .	3-57	36	42	Fitchburg, .	3-17
18	24	Paxton, .	3-56	51	43	Bolton, .	3-11
17	25	Milford, .	3-54	44	44	Charlton, .	3-11
41	26	Sturbridge, .	3-49	28	45	Petersham, .	3-11
25	27	Hardwick, .	3-47	43	46	Southbridge, .	3-07
35	28	N. Braintree, .	3-45	49	47	Oakham, .	3-04
26	29	Clinton, .	3-43	46	48	Winchendon, .	3-01
20	30	Warren, .	3-42	48	49	Auburn, .	2-95
33	31	Ashburnham, .	3-35	50	50	Dana, .	2-87
30	32	Barre, .	3-35	56	51	Mendon, .	2-79
21	33	Webster, .	3-33	53	52	Hubbardston, .	2-72
34	34	Worcester, .	3-33	54	53	Lunenburg, .	2-66
47	35	Athol, .	3-28	27	54	Rutland, .	2-63
29	36	Southborough, .	3-25	52	55	Harvard, .	2-49
45	37	Leominster, .	3-24	55	56	Lancaster, .	2-28
40	38	Phillipston, .	3-21	57	57	Berlin, .	2-27
31	39	Northboro', .	3-20	58	58	Princeton, .	2-05

GRADUATED TABLES — SECOND SERIES.

Showing the different Counties in the State, numerically arranged, according to the Percentage of their Taxable Property appropriated for the Support of Public Schools for the Year 1884-85.

For 1883-84, by the State Valuation of 1883.	COUNTIES.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.	Amount of money raised by taxes for the support of Public Schools.	Income of surplus Revenue and of similar funds appropriated for Public Schools.	TOTALS.	Valuation of 1884.	Amount contributed for board and fuel.
1	BARNSTABLE,	\$.003-78	\$61,850 00	\$1,171 62	\$63,021 62	\$16,678,877	-
2	Franklin,	3-74	61,658 66	1,094 72	62,753 38	16,769,968	\$40 10
3	Berkshire,	3-58	129,643 61	1,704 07	131,347 68	36,732,343	171 00
4	Worcester,	3-42	488,067 70	4,906 84	492,974 54	144,133,325	493 69
5	Hampshire,	3-33	87,042 64	1,480 12	88,522 76	26,562,650	42 00
6	Middlesex,	3-22	922,253 68	5,252 48	927,506 16	288,196,455	412 62
7	Plymouth,	3-21	153,556 02	3,920 41	157,476 43	49,113,695	-
8	Hampden,	3-07	232,941 08	2,605 81	235,546 89	76,786,755	90 00
9	Essex,	3-05	541,250 02	6,739 21	547,989 23	179,464,405	160 00
10	Norfolk,	2-91	276,779 08	4,036 24	280,815 32	96,581,068	514 00
11	Bristol,	2-89	325,778 75	4,364 13	330,142 88	114,246,026	94 00
12	Suffolk,	2-04	1,384,507 57	54,059 61	1,438,567 18	705,695,275	-
13	Nantucket,	1-81	4,843 63	-	4,843 63	2,683,014	-
14	Dukes,	1-80	5,710 00	111 30	5,821 30	3,235,922	-
Aggregate for the State,		\$.002-71	\$4,675,882 44	\$91,446 56	\$4,767,329 00	\$1,756,879,778	\$2,017 41

GRADUATED TABLES — SECOND SERIES.

Showing the Arrangement of Counties according to their Appropriations, including Voluntary Contributions.

If the counties are numerically arranged, according to the percentage of their valuations appropriated for public schools, voluntary contributions of board and fuel being added to the sum raised by tax and to the income of the surplus revenue and other funds, as severally given in the previous table, the order of precedence will be as follows: —

For 1883-84, by the State Valuation of 1883.	For 1884-85, by the State Valuation of 1884.	COUNTIES.	Percentage of Valuation appropriated to Public Schools—equivalent to mills and hundredths of mills.
1	1	Barnstable,	\$.003-78
2	2	Franklin,	3-74
3	3	Berkshire,	3-58
4	4	Worcester,	3-42
6	5	Hampshire,	3-33
7	6	Middlesex,	3-22
8	7	Plymouth,	3-21
10	8	Hampden,	3-07
9	9	Essex,	3-05
11	10	Norfolk,	2-91
12	11	Bristol,	2-89
13	12	Suffolk,	2-04
5	13	Nantucket,	1-81
14	14	Dukes,	1-80
STATE,			\$.002-71

GRADUATED TABLES — THIRD SERIES.

The following table exhibits the ratio of the average attendance for the year in each town to the whole number of children between 5 and 15, according to the returns.

The ratio is expressed in decimals, continued to four figures, the first two of which are separated from the last two by a point, as only the two former are essential to denote the real per cent. Yet the ratios of many towns are so nearly equal, or the difference is so small a fraction, that the first two decimals with the appropriate mathematical sign appended, indicate no distinction. The continuation of the decimals, therefore, is simply to indicate a priority in cases where, without such continuation, the ratios would appear to be precisely similar.

In several cases the ratio of attendance exhibited in the Table is over 100 per cent. These results, supposing the registers to have been properly kept and the returns correctly made, are to be thus explained: The average attendance upon all Public Schools being compared with the whole number of children in the town between 5 and 15, the result may be over 100 per cent., because the attendance of children under 5 and over 15 may more than compensate for the absence of children between those ages. The rank of the towns standing highest in the following Table is in accordance with the returns. As the returns are often incorrect, the rank may be too high in some cases.

GRADUATED TABLES — THIRD SERIES.

[FOR THE STATE.]

In which all the Towns in the State are numerically arranged according to the AVERAGE ATTENDANCE of the Children upon the Public Schools for the year 1884-85.

	TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
1	MONROE, . . .	38	78	2.05-26	33	Carlisle, . . .	65	61	.93-85
2	Cummington, . .	121	152	1.25-62	34	Brockton, . . .	2,864	2,684	.93-72
3	Ashby, . . .	148	181	1.22-30	35	Brewster, . . .	168	157	.93-45
4	Windsor, . . .	76	91	1.19-74	36	Goshen, . . .	58	54	.93-10
5	Amesbury, . . .	573	626	1.09-25	37	Chelmsford, . .	373	346	.92-76
6	Truro, . . .	162	175	1.08-02	38	Amherst, . . .	602	557	.92-52
7	Georgetown, . .	380	405	1.06-58	39	W. St'kbr'ge, .	361	333	.92-24
8	Tyngsboro', . .	87	92	1.05-75	40	Eastham, . . .	90	83	.92-22
9	Plainfield, . . .	65	67	1.03-08	41	Winchester, . .	681	628	.92-22
10	Granby, . . .	135	137	1.01-48	42	Hancock, . . .	102	94	.92-16
11	Rockland, . . .	794	794	1.00-00	43	Falmouth, . . .	327	300	.91-74
12	Kingston, . . .	210	209	.99-52	44	Enfield, . . .	168	154	.91-67
13	Princeton, . . .	138	137	.99-28	45	Acton, . . .	263	240	.91-25
14	Harwich, . . .	503	497	.98-81	46	Everett, . . .	965	878	.90-98
15	Dunstable, . . .	63	62	.98-41	47	Provincetown, .	860	782	.90-93
16	Concord, . . .	520	510	.98-08	48	Littleton, . . .	174	158	.90-85
17	Cottage City, . .	98	96	.97-96	49	Shelburne, . . .	251	228	.90-84
18	Waltham, . . .	2,233	2,185	.97-85	50	Warwick, . . .	120	109	.90-83
19	Dedham, . . .	1,048	1,016	.96-95	51	Norwood, . . .	437	396	.90-62
20	Medway, . . .	554	531	.95-85	52	Montgomery, . .	53	48	.90-57
21	Shutesbury, . .	91	87	.95-60	53	Orange, . . .	620	561	.90-48
22	Winthrop, . . .	156	149	.95-51	54	Natick, . . .	1,571	1,418	.90-26
23	Boxborough, . .	44	42	.95-45	55	Greenfield, . . .	822	739	.89-90
24	Barnstable, . . .	620	591	.95-32	56	Charlton, . . .	281	252	.89-68
25	Otis, . . .	125	119	.95-20	57	S. Abington, . .	598	535	.89-46
26	Leverett, . . .	123	117	.95-12	58	Watertown, . . .	1,027	917	.89-29
27	Northboro', . .	261	248	.95-02	59	Edgartown, . . .	147	131	.89-12
28	Abington, . . .	601	566	.94-18	60	Upton, . . .	312	278	.89-10
29	Wellfleet, . . .	275	259	.94-18	61	E. Bridgew'r, .	449	399	.88-86
30	Worthington, . .	103	97	.94-17	62	Plymouth, . . .	1,174	1,043	.88-84
31	Prescott, . . .	83	78	.93-98	63	Winchendon, . .	685	608	.88-76
32	Rowe, . . .	82	77	.93-90	64	Foxborough, . .	382	339	.88-74

SCHOOL RETURNS.

CXXV

	TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
65	Sterling, .	224	198	.88-39	113	Wayland, .	343	291	.84-84
66	Harvard, .	154	136	.88-31	114	Athol, .	837	710	.84-83
67	Sandwich, .	385	340	.88-31	115	Ashburnham, .	302	255	.84-44
68	Medford, .	1,437	1,266	.88-10	116	Ayer, .	415	350	.84-34
69	Bradford, .	487	429	.88-09	117	Gloucester, .	4,028	3,395	.84-29
70	Cohasset, .	343	302	.88-05	118	Middleboro', .	807	679	.84-14
71	Lunenburg, .	140	123	.87-86	119	Chester, .	220	185	.84-09
72	Swampscott, .	386	339	.87-82	120	Fairhaven, .	446	375	.84-08
73	Royalston, .	195	171	.87-69	121	Maynard, .	470	395	.84-04
74	Oxford, .	356	312	.87-64	122	Belmont, .	300	252	.84-00
75	Heath, .	105	92	.87-62	123	Weymouth, .	2,041	1,714	.83-98
76	Westminster, .	287	251	.87-44	124	Brookline, .	1,409	1,183	.83-96
77	Hawley, .	111	97	.87-39	125	Brookfield, .	576	483	.83-95
78	Reading, .	578	504	.87-20	126	Chilmark, .	56	47	.83-93
79	Danvers, .	1,069	932	.87-18	127	Conway, .	305	256	.83-93
80	Lee, .	790	688	.87-09	128	Leominster, .	952	799	.83-93
81	Dennis, .	511	445	.87-08	129	Hyde Park, .	1,696	1,423	.83-90
82	Shrewsbury, .	270	235	.87-04	130	Westboro', .	823	690	.83-84
83	Boylston, .	154	134	.87-01	131	Bridgewater, .	555	465	.83-78
84	Petersham, .	154	134	.87-01	132	Marlboro', .	2,100	1,756	.83-62
85	Tyringham, .	92	80	.86-96	133	Chesterfield, .	122	1,020	.83-61
86	Wendell, .	84	73	.86-90	134	Greenwich, .	84	70	.83-33
87	Hadley, .	351	305	.86-89	135	Marshfield, .	228	190	.83-33
88	So. Hadley, .	655	568	.86-72	136	Manchester, .	251	209	.83-27
89	New Salem, .	127	110	.86-61	137	Rutland, .	196	163	.83-16
90	Mendon, .	186	161	.86-56	138	Marion, .	154	128	.83-12
91	Mashpee, .	52	45	.86-54	139	Melrose, .	1,132	940	.83-04
92	Holliston, .	532	460	.86-47	140	Pepperell, .	424	352	.83-02
93	N. Reading, .	133	115	.86-47	141	Bolton, .	146	121	.82-88
94	N. Braintree, .	103	89	.86-41	142	Hopkinton, .	787	652	.82-86
95	Dana, .	109	94	.86-24	143	Shirley, .	210	174	.82-86
96	Holbrook, .	417	359	.86-09	144	Russell, .	157	130	.82-80
97	Stockbridge, .	323	278	.86-07	145	Wrentham, .	469	388	.82-73
98	Stoneham, .	881	758	.86-04	146	Merrimac, .	433	358	.82-68
99	Randolph, .	676	581	.85-95	147	Deerfield, .	617	510	.82-66
100	Wareham, .	573	492	.85-86	148	Longmeadow, .	241	199	.82-57
101	Mansfield, .	462	396	.85-71	149	Weston, .	235	194	.82-55
102	Rockport, .	802	686	.85-54	150	Sudbury, .	188	155	.82-45
103	Wellesley, .	391	334	.85-42	151	Hingham, .	669	551	.82-36
104	Erving, .	143	122	.85-33	152	Ashland, .	481	395	.82-12
105	Hubbardston, .	224	191	.85-27	153	Dalton, .	418	343	.82-06
106	Oakham, .	129	110	.85-27	154	Phillipston, .	89	73	.82-02
107	Mattapoisett, .	176	150	.85-23	155	Williamsb'rg, .	434	356	.82-02
108	Savoy, .	108	92	.85-19	156	Newton, .	3,653	2,992	.81-91
109	Sturbridge, .	378	322	.85-19	157	Huntington, .	186	152	.81-72
110	Hinsdale, .	397	338	.85-14	158	Brimfield, .	175	143	.81-71
111	Framingham, .	1,240	1,054	.85-00	159	Medfield, .	199	162	.81-41
112	Carver, .	192	163	.84-90	160	Milford, .	1,710	1,392	.81-40

TOWNS.				TOWNS.					
		No. of children between 5 and 15 years of age in each town.	Average attendance upon Schools.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.			No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
161	Saugus, .	500	407	.81-40	209	Taunton, .	3,892	3,009	.77-31
162	Needham, .	517	420	.81-24	210	Hanover, .	333	257	.77-18
163	Bourne, .	223	181	.81-17	211	Barre, .	368	284	.77-17
164	Sunderland, .	148	120	.81-08	212	Hampden, .	165	127	.76-97
165	Millbury, .	898	728	.81-07	213	Granville, .	230	177	.76-96
166	Walpole, .	431	348	.80-74	214	Milton, .	612	471	.76-96
167	Northfield, .	247	199	.80-57	215	Southwick, .	195	150	.76-93
168	Chatham, .	370	298	.80-54	216	Middlefield, .	138	106	.76-81
169	Templeton, .	532	428	.80-45	217	Northampt'n, .	2,383	1,830	.76-79
170	G. Barringt'n, .	840	674	.80-24	218	Hardwick, .	542	416	.76-75
171	Bellingham, .	197	158	.80-20	219	Easthampt'n, .	804	617	.76-74
172	Blandford, .	196	157	.80-10	220	Canton, .	906	695	.76-71
173	Braintree, .	693	555	.80-09	221	Dover, .	90	69	.76-67
174	Nahant, .	140	112	.80-00	222	Pembroke, .	200	153	.76-50
175	Tisbury, .	200	160	.80-00	223	Dighton, .	302	231	.76-49
176	Wenham, .	134	107	.79-85	224	Essex, .	285	218	.76-49
177	N. Brookfield, .	808	639	.79-84	225	Belchertown, .	506	387	.76-48
178	Westford, .	390	311	.79-74	226	W. Newbury, .	301	230	.76-41
179	Hudson, .	853	679	.79-60	227	Lynn, .	7,087	5,403	.76-24
180	Fitchburg, .	2,793	2,223	.79-59	228	Salisbury, .	828	630	.76-09
181	Marblehead, .	1,371	1,091	.79-58	229	Leicester, .	602	458	.76-08
182	Norfolk, .	156	124	.79-49	230	Chelsea, .	4,464	3,395	.76-05
183	W. Springf'd, .	845	671	.79-41	231	Westport, .	497	377	.75-86
184	Paxton, .	92	73	.79-35	232	Pittsfield, .	2,870	2,176	.75-82
185	Ipswich, .	651	516	.79-26	233	Beverly, .	1,513	1,144	.75-61
186	Colerain, .	350	277	.79-14	234	Berlin, .	179	135	.75-42
187	Somerset, .	473	374	.79-07	235	Peabody, .	1,913	1,442	.75-38
188	Duxbury, .	300	237	.79-00	236	Sandisfield, .	206	155	.75-24
189	Ashfield, .	180	142	.78-89	237	Auburn, .	242	182	.75-21
190	Easton, .	800	629	.78-63	238	Somerville, .	6,032	4,533	.75-15
191	Tolland, .	70	55	.78-57	239	New Bedford, .	5,131	3,853	.75-09
192	Sutton, .	530	414	.78-11	240	Berkley, .	156	117	.75-00
193	Methuen, .	767	599	.78-10	241	Andover, .	882	661	.74-94
194	Spencer, .	1,764	1,377	.78-06	242	N. Andover, .	702	526	.74-93
195	N. Marlboro', .	331	258	.77-95	243	Warren, .	749	561	.74-90
196	Clinton, .	1,768	1,378	.77-94	244	Cheshire, .	308	230	.74-68
197	Lexington, .	412	321	.77-91	245	Northbridge, .	773	577	.74-64
198	Attleboro', .	2,231	1,738	.77-90	246	Freetown, .	228	170	.74-56
199	W. Bri'gew'r, .	285	220	.77-89	247	W. Boylston, .	578	429	.74-22
200	Arlington, .	935	728	.77-86	248	Boston, .	66,560	49,316	.74-09
201	Raynham, .	270	210	.77-78	249	Ware, .	1,012	748	.73-91
202	Lancaster, .	319	248	.77-65	250	Buckland, .	337	248	.73-59
203	Washington, .	76	59	.77-63	251	Wales, .	155	114	.73-55
204	Scituate, .	500	388	.77-60	252	Charlemont, .	147	108	.73-47
205	Lynnfield, .	120	93	.77-50	253	Holden, .	462	338	.73-16
206	Rehoboth, .	275	213	.77-45	254	Yarmouth, .	315	230	.73-02
207	Grafton, .	872	675	.77-41	255	Lanesboro', .	262	191	.72-90
208	Boxford, .	137	106	.77-37	256	Bedford, .	136	99	.72-79

SCHOOL RETURNS.

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TOWNS.				TOWNS.					
	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		
257	Cambridge, .	10682	7,763	.72-67	303	Blackstone, .	994	673	.67-71
258	Plympton, .	95	69	.72-63	304	W.Brookfield, .	353	239	.67-71
259	Swansea, .	226	164	.72-57	305	Pern, .	65	44	.67-69
260	Townsend, .	339	246	.72-57	306	Topsfield, .	176	119	.67-61
261	Orleans, .	174	126	.72-41	307	Hatfield, .	295	198	.67-12
262	Middleton, .	134	97	.72-39	308	Billerica, .	379	254	.67-02
263	Wakefield, .	1,258	909	.72-26	309	Newbury, .	283	189	.66-78
264	Seekonk, .	227	164	.72-25	310	Quincy, .	2,734	1,817	.66-46
265	Groveland, .	394	284	.72-08	311	Agawam, .	461	306	.66-38
266	Bernardston, .	150	108	.72-00	312	Lakeville, .	179	118	.65-92
267	Hanson, .	213	153	.71-83	313	Tewksbury, .	228	150	.65-79
268	Florida, .	124	89	.71-77	314	Egremont, .	127	83	.65-35
269	Woburn, .	2,421	1,737	.71-75	315	Wilmington, .	169	110	.65-09
270	Monson, .	594	426	.71-72	316	Nantucket, .	540	350	.64-81
271	Westhampt'n, .	113	81	.71-68	317	N. Ashford, .	33	21	.63-64
272	Wilbraham, .	264	189	.71-59	318	N. Adams, .	2,765	1,745	.63-11
273	Uxbridge, .	545	390	.71-56	319	Lenox, .	449	282	.62-81
274	Dracut, .	330	236	.71-52	320	Hull, .	75	47	.62-67
275	Haverhill, .	3,569	2,552	.71-50	321	Lawrence, .	7,177	4,485	.62-49
276	Sherborn, .	182	130	.71-43	322	Gill, .	161	100	.62-11
277	Revere, .	604	431	.71-36	323	Gardner, .	1,378	853	.61-90
278	Westfield, .	1,557	1,108	.71-16	324	Monterey, .	112	69	.61-61
279	Palmer, .	1,175	834	.70-98	325	Holland, .	57	35	.61-40
280	Montague, .	1,347	953	.70-75	326	Dartmouth, .	578	354	.61-25
281	Ludlow, .	345	244	.70-72	327	Springfield, .	6,583	4,028	.61-19
282	Leyden, .	122	86	.70-49	328	Alford, .	64	39	.60-94
283	Worcester, .	12884	9,074	.70-43	329	Halifax, .	80	48	.60-00
284	Rowley, .	226	159	.70-35	330	Fall River, .	11767	6,918	.58-79
285	Lincoln, .	171	120	.70-12	331	Stoughton, .	956	556	.58-16
286	Stow, .	200	140	.70-00	332	Salem, .	5,212	3,022	.57-98
287	Franklin, .	784	547	.69-77	333	Malden, .	2,846	1,639	.57-59
288	Groton, .	304	212	.69-74	334	Mt. Wash'ton, .	28	16	.57-14
289	So. Scituate, .	283	197	.69-61	335	Lowell, .	11168	6,095	.54-58
290	Southampt'n, .	177	123	.69-49	336	Gay Head, .	22	12	.54-55
291	Sharon, .	219	152	.69-41	337	Richmond, .	247	133	.53-85
292	Adams, .	1,660	1,152	.69-40	338	Clarksburg, .	160	84	.52-50
293	Rochester, .	179	124	.69-27	339	Whately, .	200	103	.51-50
294	Sheffield, .	409	283	.69-19	340	Williamst'wn	656	337	.51-37
295	Acushnet, .	191	132	.69-11	341	Webster, .	1,155	584	.50-56
296	Burlington, .	123	85	.69-11	342	Dudley, .	633	319	.50-39
297	Hamilton, .	110	76	.69-09	343	Chicopee, .	2,185	1,043	.47-73
298	Southboro', .	287	198	.68-92	344	Gosnold, .	21	10	.47-62
299	Norton, .	308	211	.68-51	345	Southbridge, .	1,362	622	.45-67
300	Douglas, .	436	298	.68-35	346	Newburyp'rt, .	2,687	1,181	.43-95
301	Becket, .	192	131	.68-23	347	Holyoke, .	5,617	2,441	.43-46
302	Pelham, .	97	66	.68-04					

GRADUATED TABLES — THIRD SERIES.

[COUNTY TABLES.]

In which all the Towns in the respective Counties in the State are numerically arranged according to the AVERAGE ATTENDANCE of their Children upon the Public Schools for the year 1884-85.

[For an explanation of the principles on which the Tables are constructed, see *ante*, p. cxxiii.]

BARNSTABLE COUNTY.

TOWNS.					TOWNS.				
		No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.			No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
1	TRURO, .	162	175	1.08-02	9	Sandwich, .	385	340	.88-31
2	Harwich, .	503	497	.98-81	10	Dennis, .	511	445	.87-08
3	Barnstable, .	620	591	.95-32	11	Mashpee, .	52	45	.86-54
4	Wellfleet, .	275	259	.94-18	12	Bourne, .	223	181	.81-17
5	Brewster, .	168	157	.93-45	13	Chatham, .	370	298	.80-54
6	Eastham, .	90	83	.92-22	14	Yarmouth, .	315	230	.73-02
7	Falmouth, .	327	300	.91-74	15	Orleans, .	174	126	.72-41
8	Provincet'n, .	860	782	.90-93					

BERKSHIRE COUNTY.

1	WINDSOR, . .	76	91	1.19-74	17	Lanesboro', .	262	191 .72-90
2	Otis, . .	125	119	.95-20	18	Florida, .	124	89 .71-77
3	W. Stockbr'ge	361	333	.92-24	19	Adams, .	1,660	1,152 .69-40
4	Hancock, .	102	94	.92-16	20	Sheffield, .	409	283 .69-19
5	Lee, . .	790	688	.87-09	21	Becket, .	192	131 .68-23
6	Tyringham, .	92	80	.86-96	22	Peru, . .	65	44 .67-69
7	Stockbridge, .	323	278	.86-07	23	Egremont, .	127	83 .65-35
8	Savoy, . .	108	92	.85-19	24	N. Ashford, .	33	21 .63-64
9	Hinsdale, .	397	338	.85-14	25	No. Adams, .	2,765	1,745 .63-11
10	Dalton, . .	418	343	.82-06	26	Lenox, . .	449	282 .62-81
11	G. Barrington	840	674	.80-24	27	Monterey, .	112	69 .61-61
12	N. Marlboro',	331	258	.77-95	28	Alford, . .	64	39 .60-64
13	Washington, .	76	59	.77-63	29	Mt. Wash'g'n,	28	16 .57-14
14	Pittsfield, .	2,870	2,176	.75-82	30	Richmond, .	247	133 .53-85
15	Sandisfield, .	206	155	.75-24	31	Clarksburg, .	160	84 .52-50
16	Cheshire, . .	308	230	.74-68	32	Williamsto'n,	656	337 .51-37

SCHOOL RETURNS.

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BRISTOL COUNTY.

TOWNS.					TOWNS.				
		No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.			No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
1	MANSFIELD, .	462	396	.85-71	11	N. Bedford, .	5,131	3,853	.75-09
2	Fairhaven, .	446	375	.84-08	12	Berkley, .	156	117	.75-00
3	Somerset, .	473	374	.79-07	13	Freetown, .	228	170	.74-56
4	Easton, .	800	629	.78-63	14	Swansea, .	226	164	.72-57
5	Attleboro', .	2,231	1,738	.77-90	15	Seekonk, .	227	164	.72-25
6	Raynham, .	270	210	.77-78	16	Acushnet, .	191	132	.69-11
7	Rehoboth, .	275	213	.77-45	17	Norton, .	308	211	.68-51
8	Taunton, .	3,892	3,009	.77-31	18	Dartmouth, .	578	354	.61-25
9	Dighton, .	302	231	.76-49	19	Fall River, .	11767	6,918	.58-79
10	Westport, .	497	377	.75-86					

DUKES COUNTY.

1	COTTAGE CITY, .	98	96	.97-96	4	Tisbury, .	200	160	.80-00
2	Edgartown, .	147	131	.89-12	5	Gay Head, .	22	12	.54-55
3	Chilmark, .	56	47	.83-93	6	Gosnold, .	21	10	.47-62

ESSEX COUNTY.

1	AMESBURY, .	573	626	1.09-25	19	W. Newbury, .	301	230	.76-41
2	Georgetown, .	380	405	1.06-58	20	Lynn, .	7,087	5,403	.76-24
3	Bradford, .	487	429	.88-09	21	Salisbury, .	828	630	.76-09
4	Swampscott, .	386	339	.87-82	22	Beverly, .	1,513	1,144	.75-61
5	Danvers, .	1,069	932	.87-18	23	Peabody, .	1,913	1,442	.75-38
6	Rockport, .	802	686	.85-54	24	Andover, .	882	661	.74-94
7	Gloucester, .	4,028	3,395	.84-29	25	N. Andover, .	702	526	.74-93
8	Manchester, .	251	209	.83-27	26	Middleton, .	134	97	.72-39
9	Merrimac, .	433	358	.82-68	27	Groveland, .	394	284	.72-08
10	Saugus, .	500	407	.81-40	28	Haverhill, .	3,569	2,552	.71-50
11	Nahant, .	140	112	.80-00	29	Rowley, .	226	159	.70-35
12	Wenham, .	134	107	.79-85	30	Hamilton, .	110	760	.69-09
13	Marblehead, .	1,371	1,091	.79-58	31	Topsfield, .	176	119	.67-61
14	Ipswich, .	651	516	.79-26	32	Newbury, .	283	189	.66-78
15	Methuen, .	767	599	.78 10	33	Lawrence, .	7,177	4,485	.62-49
16	Lynnfield, .	120	93	.77-50	34	Salem, .	5,212	3,022	.57-98
17	Boxford, .	137	106	.77-37	35	Newburyport	2,687	1,181	.43-95
18	Essex, .	285	218	.76-49					

BOARD OF EDUCATION.

FRANKLIN COUNTY.

	TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
1	MONROE, .	38	78	2.05-26	14	Conway, .	305	256	.83-93
2	Shutesbury, .	91	87	.95-60	15	Deerfield, .	617	510	.82-66
3	Leverett, .	123	117	.95-12	16	Sunderland, .	148	120	.81-08
4	Rowe, .	82	77	.93-90	17	Northfield, .	247	199	.80-57
5	Shelburne, .	251	228	.90-84	18	Colerain, .	350	277	.79-14
6	Warwick, .	120	109	.90-83	19	Ashfield, .	180	142	.78-89
7	Orange, .	620	561	.90-48	20	Buckland, .	337	248	.73-59
8	Greenfield, .	822	739	.89-90	21	Charlemont, .	147	108	.73-47
9	Heath, .	105	92	.87-62	22	Bernardston, .	150	108	.72-00
10	Hawley, .	111	97	.87-39	23	Montague, .	1,347	953	.70-75
11	Wendell, .	84	73	.86-90	24	Leyden, .	122	86	.70-49
12	New Salem, .	127	110	.86-61	25	Gill, .	161	100	.62-11
13	Erving, .	143	122	.85-33	26	Whately, .	200	103	.51-50

HAMPDEN COUNTY.

1	MONTGOMERY, .	53	48	.90-57	12	Wales, .	155	114	.73-55
2	Chester, .	220	185	.84-09	13	Monson, .	594	426	.71-72
3	Russell, .	157	130	.82-80	14	Wilbraham, .	264	189	.71-59
4	Longmead'w, .	241	199	.82-57	15	Westfield, .	1,557	1,108	.71-16
5	Brimfield, .	175	143	.81-71	16	Palmer, .	1,175	834	.70-98
6	Blandford, .	196	157	.80-10	17	Ludlow, .	345	244	.70-72
7	W. Springf'd, .	845	671	.79-41	18	Agawam, .	461	306	.66-38
8	Tolland, .	70	55	.78-57	19	Holland, .	57	35	.61-40
9	Hampden, .	165	127	.76-97	20	Springfield, .	6,583	4,028	.61-19
10	Granville, .	230	177	.76-96	21	Chicopee, .	2,185	1,043	.47-73
11	Southwick, .	195	150	.76-93	22	Holyoke, .	5,617	2,441	.43-46

HAMPSHIRE COUNTY.

1	CUMMINGTON, .	121	152	1.25-62	13	Williamsb'g, .	434	356	.82-02
2	Plainfield, .	65	67	1.03-08	14	Huntington, .	186	152	.81-72
3	Granby, .	135	137	1.01-48	15	Middlefield, .	138	106	.76-81
4	Worthington, .	103	97	.94-17	16	Northampt'n, .	2,383	1,830	.76-79
5	Prescott, .	83	78	.93-98	17	Easthampt'n, .	804	617	.76-74
6	Goshen, .	58	54	.93-10	18	Belchertown, .	506	387	.76-48
7	Amherst, .	602	557	.92-52	19	Ware, .	1,012	748	.73-91
8	Enfield, .	168	154	.91-67	20	Westhampt'n, .	113	810	.71-68
9	Hadley, .	351	305	.86-89	21	Southampt'n, .	177	123	.69-49
10	South Hadley, .	655	568	.86-72	22	Pelham, .	97	66	.68-04
11	Chesterfield, .	122	102	.83-61	23	Hatfield, .	295	198	.67-12
12	Greenwich, .	84	70	.83-33					

SCHOOL RETURNS.

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MIDDLESEX COUNTY.

TOWNS.				TOWNS.			
	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
1 ASHBY, .	148	181	1.22-30	28 Hopkinton, .	787	652	.82-86
2 Tyngsboro', .	87	92	1.05-75	29 Shirley, .	210	174	.82-86
3 Dunstable, .	63	62	.98-41	30 Weston, .	235	194	.82-55
4 Concord, .	520	510	.98-08	31 Sudbury, .	188	155	.82-45
5 Waltham, .	2,233	2,185	.97-85	32 Ashland, .	481	395	.82-12
6 Boxborough, .	44	42	.95-45	33 Newton, .	3,653	2,992	.81-91
7 Carlisle, .	65	61	.93-85	34 Westford, .	390	311	.79-74
8 Chelmsford, .	373	346	.92-76	35 Hudson, .	853	679	.79-60
9 Winchester, .	681	628	.92-22	36 Lexington, .	412	321	.77-91
10 Acton, .	263	240	.91-25	37 Arlington, .	935	728	.77-86
11 Everett, .	965	878	.90-98	38 Somerville, .	6,032	4,533	.75-15
12 Littleton, .	174	158	.90-85	39 Bedford, .	136	99	.72-79
13 Natick, .	1,571	1,418	.90-26	40 Cambridge, .	10,682	7,763	.72-67
14 Watertown, .	1,027	917	.89-29	41 Townsend, .	339	246	.72-57
15 Medford, .	1,437	1,266	.88-10	42 Wakefield, .	1,258	909	.72-26
16 Reading, .	578	504	.87-20	43 Woburn, .	2,421	1,737	.71-75
17 Holliston, .	532	460	.86-47	44 Dracut, .	330	236	.71-52
18 No. Reading, .	133	115	.86-47	45 Sherborn, .	182	130	.71-43
19 Stoneham, .	881	758	.86-04	46 Lincoln, .	171	120	.70-12
20 Framingham, .	1,240	1,054	.85-00	47 Stow, .	200	140	.70-00
21 Wayland, .	343	291	.84-84	48 Groton, .	304	212	.69-74
22 Ayer, .	415	350	.84-34	49 Burlington, .	123	85	.69-11
23 Maynard, .	470	395	.84-04	50 Billerica, .	379	254	.67-02
24 Belmont, .	300	252	.84-00	51 Tewksbury, .	228	150	.65-79
25 Marlboro'gh, .	2,100	1,756	.83-62	52 Wilmington, .	169	110	.65-09
26 Melrose, .	1,132	940	.83-04	53 Malden, .	2,846	1,639	.57-59
27 Pepperell, .	424	352	.83-02	54 Lowell, .	11,168	6,095	.54-58

NANTUCKET COUNTY.

1 NANTUCKET,	540	350	.64-81
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NORFOLK COUNTY.

1 DEDHAM, .	1,048	1,016	.96-95	7 Randolph, .	676	581	.85-95
2 Medway, .	554	531	.95-85	8 Wellesley, .	391	334	.85-42
3 Norwood, .	437	396	.90-62	9 Weymouth, .	2,041	1,714	.83-98
4 Foxborough, .	382	339	.88-74	10 Brookline, .	1,409	1,183	.83-96
5 Cohasset, .	343	302	.88-05	11 Hyde Park, .	1,696	1,423	.83-90
6 Holbrook, .	417	359	.86-09	12 Wrentham, .	469	388	.82-73

BOARD OF EDUCATION.

NORFOLK COUNTY — CONCLUDED.

	TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		TOWNS.	No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.
13	Medfield, .	199	162	.81-41	20	Canton, .	906	695	.76-71
14	Needham, .	517	420	.81-24	21	Dover, .	90	69	.76-67
15	Walpole, .	431	348	.80-74	22	Franklin, .	784	547	.69-77
16	Bellingham,	197	158	.80-20	23	Sharon, .	219	152	.69-41
17	Braintree, .	693	555	.80-09	24	Quincy, .	2,734	1,817	.66-46
18	Norfolk, .	156	124	.79-49	25	Stoughton, .	956	556	.58-16
19	Milton, .	612	471	.76-96					

PLYMOUTH COUNTY.

1	ROCKLAND, .	794	794	1.00-00	15	Hingham, .	669	551	.82-36
2	Kingston, .	210	209	.99-52	16	Duxbury, .	300	237	.79-00
3	Abington, .	601	566	.94-18	17	W.Bridgew'r,	285	222	.77-89
4	Brockton, .	2,864	2,684	.93-72	18	Scituate, .	500	388	.77-60
5	S. Abington,	598	535	.89-46	19	Hanover, .	333	257	.77-18
6	E. Bridgew'r,	449	399	.88-86	20	Pembroke, .	200	153	.76-50
7	Plymouth, .	1,174	1,043	.88-84	21	Plympton, .	95	69	.72-63
8	Wareham, .	573	492	.85-86	22	Hanson, .	213	153	.71-83
9	Mattapoisett,	176	150	.85-23	23	So. Scituate,	283	197	.69-61
10	Carver, .	192	163	.84-90	24	Rochester, .	179	124	.69-27
11	Middleboro',	807	679	.84-14	25	Lakeville, .	179	118	.65-92
12	Bridgewater,	555	465	.83-78	26	Hull, .	75	47	.62-67
13	Marshfield, .	228	190	.83-33	27	Halifax, .	80	48	.60-00
14	Marion, .	154	128	.83-12					

SUFFOLK COUNTY.

1	WINTHROP, .	156	149	.95-51	3	Boston, .	66560	49316	.74-09
2	Chelsea, .	4,464	3,395	.76-05	4	Revere, .	604	431	.71-36

WORCESTER COUNTY.

1	PRINCETON, .	138	137	.99-28	7	Harvard, .	154	136	.88-31
2	Northboro', .	261	248	.95-02	8	Lunenburg, .	140	123	.87-86
3	Charlton, .	281	252	.89-68	9	Royalston, .	195	171	.87-69
4	Upton, .	312	278	.89-10	10	Oxford, .	356	312	.87-64
5	Winchendon,	685	608	.88-76	11	Westminster,	287	251	.87-44
6	Sterling, .	224	198	.88-39	12	Shrewsbury,	270	235	.87-04

SCHOOL RETURNS.

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WORCESTER COUNTY — CONCLUDED.

TOWNS.				TOWNS.					
	No. of children between 5 and 15 years of age in each town.	Average attendance upon Schools.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		No. of children between 5 and 15 years of age in each town.	Average attendance upon School.	Ratio of attendance to the whole No. of children between 5 and 15, expressed in decimals.		
13	Boylston, .	154	134	.87-01	36	Spencer, .	1,764	1,377	.78-06
14	Petersham, .	154	134	.87-01	37	Clinton, .	1,768	1,378	.77-94
15	Mendon, .	186	161	.86-56	38	Lancaster, .	319	248	.77-65
16	N. Braintree, .	103	89	.86-41	39	Grafton, .	872	675	.77-41
17	Dana, .	109	94	.86-24	40	Barre, .	368	284	.77-17
18	Hubbardston, .	224	191	.85-27	41	Hardwick, .	542	416	.76-75
19	Oakham, .	129	110	.85-27	42	Leicester, .	602	458	.76-08
20	Sturbridge, .	378	322	.85-19	43	Berlin, .	179	135	.75-42
21	Athol, .	837	710	.84-83	44	Auburn, .	242	182	.75-21
22	Ashburnham, .	302	255	.84-44	45	Warren, .	749	561	.74-90
23	Brookfield, .	576	486	.83-95	46	Northbridge, .	773	577	.74-64
24	Leominster, .	952	799	.83-93	47	W. Boylston, .	578	429	.74-22
25	Westboro', .	823	690	.83-84	48	Holden, .	462	338	.73-16
26	Rutland, .	196	163	.83-16	49	Uxbridge, .	545	390	.71-56
27	Bolton, .	146	121	.82-88	50	Worcester, .	12884	9,074	.70-43
28	Phillipston, .	89	73	.82-02	51	Southboro', .	287	198	.68-92
29	Milford, .	1,710	1,392	.81-40	52	Douglas, .	436	298	.68-35
30	Millbury, .	898	728	.81-07	53	Blackstone, .	994	673	.67-71
31	Templeton, .	532	428	.80-45	54	W. Brookfi'd, .	353	239	.67-71
32	N. Brookfield, .	808	639	.79-84	55	Gardner, .	1,378	853	.61-90
33	Fitchburg, .	2,793	2,223	.79-59	56	Webster, .	1,155	584	.50-56
34	Paxton, .	92	73	.79-35	57	Dudley, .	633	319	.50-39
35	Sutton, .	530	414	.78-11	58	Southbridge, .	1,362	622	.45-67

TABLE in which all the Counties are numerically arranged, according to the AVERAGE ATTENDANCE of their Children upon the Public Schools for the year 1884-85.

1883-84.	1884-85.	COUNTIES.	Ratio of Attendance.
1	1	BARNSTABLE, . . . . .	.89-55
4	2	Plymouth, . . . . .	.86-64
3	3	Dukes, . . . . .	.83-82
2	4	Franklin, . . . . .	.81-10
6	5	Hampshire, . . . . .	.80-59
5	6	Norfolk, . . . . .	.79-75
8	7	Middlesex, . . . . .	.74-66
10	8	Worcester, . . . . .	.74-41
9	9	Suffolk, . . . . .	.74-24
12	10	Berkshire, . . . . .	.72-46
11	11	Essex,71-82
7	12	Bristol,68-99
13	13	Nantucket,64-81
14	14	Hampden,59-52
STATE,73-86

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